



0000135687

ORIGINAL

MEMORANDUM

TO: Docket Control

FROM: Steven M. Olea
Director
Utilities Division

DATE April 5, 2012

RE: STAFF REPORT FOR SABROSA WATER COMPANY'S APPLICATIONS
FOR A RATE INCREASE AND TWO AUTHORIZATIONS FOR FINANCING
(DOCKET NOS. W-02111A-11-0272, W-02111A-11-0340 and W-02111A-11-
0435)

Attached is the Staff Report for Sabrosa Water Company's applications for a permanent rate increase and authorizations for financing. Staff recommends approval of its rates and charges as shown in Schedule BCA-4. Staff recommends approval of the financing applications, as described in this Report.

Any party who wishes may file comments to the Staff Report with the Commission's Docket Control by 4:00 p.m. on or before April 13, 2012.

SMO:BCA:tdp

Originator: Brendan C. Aladi

Arizona Corporation Commission
DOCKETED

APR - 5 2012

DOCKETED BY	<i>mn</i>
-------------	-----------

RECEIVED
AZ CORP COMMISSION
DOCKET CONTROL
2012 APR 5 PM 10:45

Service List for: Sabrosa Water Company
Docket Nos. W-02111A-11-0272, et al

Mr. Don Bohlier, Interim Manager
Sabrosa Water Company
303 East Gurley Street
PMB 445
Prescott, Arizona 86301

**STAFF REPORT
UTILITIES DIVISION
ARIZONA CORPORATION COMMISSION**

**SABROSA WATER COMPANY
DOCKET NOS. W-02111A-11-0272, W-02111A-11-0340 and
W-02111A-11-0435**

**APPLICATION
FOR A
PERMANENT RATE INCREASE**

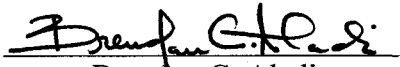
AND TWO

**APPLICATIONS
FOR APPROVAL OF FINANCINGS**

APRIL 5, 2012

STAFF ACKNOWLEDGMENT

The Staff Report for Sabrosa Water Company (Docket Nos. W-02111A-11-0272, W-02111A-11-0340 and W-02111A-11-0435) is the responsibility of the Staff members listed below. Brendan C. Aladi and Katalin Nagy are responsible for the review and analysis of the applications, recommended revenue requirement, rate base, rate design and financial analyses. Dorothy Hains is responsible for the engineering and technical analysis. Guadalupe Ortiz is responsible for analysis of customer complaints, opinions and other consumer data relative to these applications.




Brendan C. Aladi

Public Utilities Analyst III



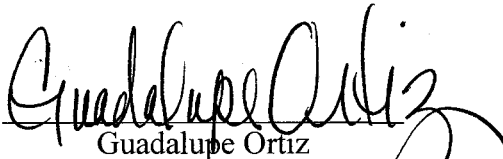
Katalin Nagy

Public Utilities Analyst I



Dorothy Hains

Utilities Engineer



Guadalupe Ortiz

Public Utilities Consumer Analyst I

EXECUTIVE SUMMARY
SABROSA WATER COMPANY
Docket Nos. W-02111A-11-0272, ET AL

Sabrosa Water Company ("Sabrosa" or "Company") is located about twenty miles north of Phoenix in New River, Arizona. On July 7, 2011, Sabrosa filed an application for a permanent rate increase with the Arizona Corporation Commission ("Commission"). On September 9, 2011, the Company filed an application for approval of financing for a Water Infrastructure Finance Authority of Arizona ("WIFA") loan to fund arsenic treatment facilities. On November 2, 2011, the Company filed a revised application for the arsenic treatment facilities. On December 6, 2011, the Company filed a second financing application to fund the deepening of the Company's Zorillo Well.

Sabrosa proposed total operating revenue of \$37,814, an increase of \$8,183 or 27.62 percent over the test year revenue of \$29,631, as shown on Schedule BCA-1. Although the Company proposed the increase, it failed to propose any changes in current rates; therefore, Schedules BCA-4, BCA-5, BCA-5.1, and BCA-5.2 reflect no increase in Company-proposed rates.

Staff recommends total operating revenue of \$49,996, an increase of \$18,055 or 56.53 percent over the Staff-adjusted test year revenue of \$31,941, as shown on Schedule BCA-1. In addition to this, Staff is recommending estimated WIFA loan surcharges that would generate \$20,272, and would bring total revenue to \$70,268, as shown on Schedule BCA-6.

The base rates revenue is intended to support all operations except the debt service of the loans. The debt service (i.e., principal and interest payments) will be made with revenues generated from the WIFA loan surcharges.

The estimated WIFA loan surcharges Staff recommends represent a \$20,272, or 63.47 percent increase over Staff-adjusted test year revenues of \$31,941. The sum of the components represents a total increase of \$38,327, or 119.99 percent, over Staff-adjusted test year revenue of \$31,941.

Staff's recommended rates (excluding the estimated WIFA loan surcharges) would increase the typical 5/8 x 3/4-inch meter residential bill with a median usage of 2,433 gallons from \$54.10 to \$79.46 for an increase of \$25.36, or 46.9 percent, as shown on Schedule BCA-5. The overall increase including both estimated WIFA surcharges would increase the typical 5/8 x 3/4-inch meter residential customer bill with a median usage of 2433 gallons from \$54.10 to \$117.00 for an increase of \$62.90 or 116.3 percent, as shown on Schedule BCA-5.2.

Staff's recommended rates and surcharges yield a cash flow of \$9,320, as shown on Schedule BCA-6. Staff has recommended an original cost rate base of \$37,313. Staff's revenue generated from base rates is sufficient to cover all operations and maintenance. The WIFA loan surcharges will provide for debt service on the proposed WIFA loans.

CONCLUSIONS

1. Maricopa County Environmental Services Department stated that there are major deficiencies in Operation and Maintenance and in water quality monitoring and reporting. The Sabrosa Water system has a major deficiency for exceeding the Maximum Contaminate Level for arsenic. (See §F of the Engineering report for discussion and details.)
2. The Sabrosa Water System has adequate storage capacity, but it does not have reliable, adequate well production. (See §C of the Engineering report for discussion and details.)

STAFF'S RECOMMENDATIONS

Staff recommends:

1. That the Commission approve the Staff-recommended rates and charges as shown on Schedule BCA-4.
2. That the Company file with Docket Control, as a compliance item in this Docket, a schedule of its approved rates and charges within 30 days after the Decision in this matter is issued.
3. That the Commission approve the Staff-recommended \$110,435 and \$149,877 financings and the associated surcharge mechanisms that may result in surcharges of \$15.93 and \$21.61 per month per customer.
4. That the actual amount of the WIFA loan surcharges be calculated based upon the actual amount of the WIFA loans and actual number of customers at the time of loan closing.
5. That the Company file as a compliance item in this Docket, within 30 days of the execution of any financing transaction authorized herein, a notice confirming that such execution has occurred and a certification by an authorized Company representative that the terms of the financing fully comply with the authorizations granted.
6. That the Company provide to Staff, upon request, a copy of any loan documents executed pursuant to the authorizations granted herein.
7. That, upon filing of the loan closing notice, the Company may file in this Docket an application requesting implementation of the associated surcharge.
8. That, within 30 days of the filing of a surcharge implementation request, Staff shall calculate the appropriate WIFA surcharge and prepare and file a recommended order for Commission consideration.

9. That approval of the loans and surcharges be rescinded if the Company has not drawn funds from the well-deepening loan within one year of the date of the Decision resulting from this proceeding.
10. That the execution of the second WIFA loan in the amount of \$149,877 (Arsenic Treatment Facility Loan) and the request for the associated surcharge be completed only upon the Company's deepening the well and finding a water supply that does not allow the Company to meet the ADEQ arsenic restriction requirements.
11. That, upon Commission approval of the surcharge, the Company shall open a separate interest-bearing account in which all surcharge monies collected from customers will be deposited.
12. That the only disbursements of funds from this account will be to make debt service payments to WIFA.
13. That the Company shall file, by April 15 of each year, as a compliance item in this Docket, a report reconciling all surcharge monies billed and collected, along with copies of the prior year's monthly bank statements for the surcharge account.
14. That the Company continue to use the depreciation rates as presented in Exhibit 6 of the attached Engineering Report.
15. That, because Sabrosa's calculated water loss was 46 percent, the Company shall monitor the water system closely and take action to ensure that water loss remains 10 percent or less in the future. If water loss exceeds 10 percent, calculated on an annual basis, the Company shall, prior to filing its next rate case, develop a plan to reduce water loss to 10 percent or less, or prepare a report containing a detailed analysis and explanation demonstrating why a water loss reduction to 10 percent or less is not feasible or cost effective.
16. That the Company file with Docket Control, as a compliance item in this Docket, by January 31, 2013, a copy of the Arizona Department of Environmental Quality ("ADEQ") Approval of Construction ("AOC") for the well-deepening and rehabilitation.
17. That, if it is necessary for Sabrosa to execute the second loan for the arsenic treatment plant, the Company file with Docket Control, as a compliance item in this Docket, by May 31, 2013, a copy of the ADEQ AOC for that plant.

TABLE OF CONTENTS

	<u>PAGE</u>
FACT SHEET	1
SUMMARY OF FILING.....	3
BACKGROUND	3
CONSUMER SERVICES	4
COMPLIANCE.....	5
ENGINEERING ANALYSIS AND RECOMMENDATIONS	5
RATE BASE	5
Plant-in-Service.....	6
Accumulated Depreciation.....	6
Working Capital.....	6
OPERATING INCOME STATEMENT	7
OPERATING REVENUES	7
OPERATING EXPENSES	7
REVENUE REQUIREMENT	8
RATE DESIGN	8
MISCELLANEOUS SERVICE CHARGES	8
FINANCING APPLICATIONS AND SURCHARGE MECHANISM.....	9
CONCLUSION:.....	10
STAFF'S RECOMMENDATIONS	10

SCHEDULES

Summary of Filing	Schedule BCA-1
Rate Base	Schedule BCA-2
Statement of Operating Income	Schedule BCA-3
Rate Design.....	Schedule BCA-4
Typical Bill Analysis (without surcharges)	Schedule BCA-5
Typical Bill Analysis (with one surcharge)	Schedule BCA-5.1
Typical Bill Analysis (with two surcharges)	Schedule BCA-5.2
WIFA Loan Financial Analysis	Schedule BCA-6
Calculation of Well-Deepening Surcharge	Schedule BCA-7
Calculation of Arsenic Treatment Plant Surcharge	Schedule BCA-8

ATTACHMENTS

Engineering Report for Rate Case and Financings	Attachment A
---	--------------

FACT SHEET

Company: Sabrosa Water Company

Current Rates: Decision No. 69574, dated May 21, 2007.
Decision No. 68745, dated June 5, 2006 (Water hauling surcharge tariff).

Type of Ownership: On March 20, 2002, the Arizona Corporation Commission's Corporations Division administratively dissolved the corporate entity due to the owner's failure to file its Corporate Annual Report. (Formerly it was an Arizona Subchapter "S" Corporation.)

Location: The Company is located about twenty miles north of Phoenix in New River, Arizona. The Company is located in the Phoenix Active Management Area.

Rates:

Permanent rate increase application filed: July 7, 2011.
First Financing application filed: September 9, 2011 (revised on November 2, 2011).
Second Financing application filed: December 6, 2011.

Monthly Charges:

	Company Current Rates	Company Proposed Rates	Staff Recommended Rates
Monthly Minimum Charge:			
5/8 x 3/4-inch meter	\$39.50	\$39.50	\$60.00
3/4-inch meter	39.50	39.50	60.00
1-inch meter	39.50	39.50	105.00
1 1/2-inch meter	200.00	200.00	300.00
2-inch meter	320.00	320.00	395.00
3-inch meter	600.00	600.00	960.00
4-inch meter	1,000.00	1,000.00	1,500.00
6-inch meter	2,000.00	2,000.00	3,000.00

Gallons in Minimum	0	0	0
--------------------	---	---	---

Commodity Charge:

All Meters Sizes

0 to 3,000 gallons (per 1,000 gallons)	\$6.00	\$6.00	N/A
3,001 to 10,000 gallons (per 1,000 gallons)	9.00	9.00	N/A
Over 10,000 gallons (per 1,000 gallons)	10.80	10.80	N/A

	Company Current Rates	Company Proposed Rates	Staff Recommended Rates
Commodity Charge:			
<u>5/8 x 3/4 & 3/4 -inch meters</u>			
0 to 3,000 gallons (per 1,000 gallons)	N/A	N/A	\$8.00
3,001 to 10,000 gallons (per 1,000 gallons)	N/A	N/A	\$16.00
Over 10,000 gallons (per 1,000 gallons)	N/A	N/A	\$26.00
<u>All Other Meter Sizes</u>			
0 to 8,000 gallons (per 1,000 gallons)	N/A	N/A	\$16.00
Over 8,000 gallons (per 1,000 gallons)	N/A	N/A	\$26.00
Water Hauling Surcharge	***	\$39.50	***

*** Surcharge is calculated by dividing the total water hauling costs incurred in a given month by the total amount of water sold in that month to determine a rate per 1,000 gallons. That rate is then applied to the actual gallons sold to each customer in that month to arrive at that customer's surcharge which will appear as a separate line item on that customer's bill the following month.

Customers: The Company served an average of 35 metered customers during the test year, broken out by meter size as follows:

5/8 x 3/4 – inch meter 32
1 - inch meter 2
2 – inch meter 1

Number of metered customers in prior test year (12/31/07): 58

Number of metered customers in the current test year (12/31/10): 35

Customer notification for rate application filed: On July 7, 2011, a notarized affidavit of mailing "Customer Notification" was filed for the rate application. Customer notification was filed for the arsenic treatment financing application (11-0340) and not for the well deepening financing applications financing applications (11-0435).

A research of the Consumer Service database from January 1, 2009, to February 29, 2012, revealed:

Six complaints (All resolved and closed)

Two opinions (Opposed to the rate increase)

SUMMARY OF FILING

Sabrosa Water Company ("Sabrosa" or "Company") proposed total operating revenue of \$37,814, an increase of \$8,183 or 27.62 percent over the test year revenue of \$29,631, as shown on Schedule BCA-1. Although the Company proposed the increase, it failed to propose any changes in current rates; therefore, Schedules BCA-4, BCA-5, BCA-5.1, and BCA-5.2 reflect no increase in Company-proposed rates.

Arizona Corporation Commission ("Commission") Utilities Division ("Staff") recommends total operating revenue of \$49,996, an increase of \$18,055 or 56.53 percent over the Staff-adjusted test year revenue of \$31,941, as shown on Schedule BCA-1. In addition to this, Staff is recommending Water Infrastructure Finance Authority of Arizona ("WIFA") loan surcharges that would generate approximately \$20,272 and would bring total revenue to \$70,268, as shown on Schedule BCA-6.

The base rates revenue is intended to support all operations except the debt service of the loans. The debt service (i.e., principal and interest payments) will be made with revenues generated from the WIFA loan surcharges.

The estimated WIFA loan surcharges Staff recommends represent a \$20,272, or 63.47 percent increase over Staff-adjusted test year revenues of \$31,941. The sum of the components represents a total increase of \$38,327, or 119.99 percent, over Staff-adjusted test year revenue of \$31,941.

Staff's recommended rates (excluding the WIFA loan surcharges) would increase the typical 5/8 x 3/4-inch meter residential bill with a median usage of 2,433 gallons from \$54.10 to \$79.46 for an increase of \$25.36, or 46.9 percent, as shown on Schedule BCA-5. The overall increase including both estimated WIFA surcharges would increase the typical 5/8 x 3/4-inch meter residential customer bill with a median usage of 2,433 gallons from \$54.10 to \$117.00, for an increase of \$62.90 or 116.3 percent, as shown on Schedule BCA-5.2.

Staff's recommended rates and estimated surcharges yield a cash flow of \$9,320, as shown on Schedule BCA-6. Staff recommends an original cost rate base of \$37,313. Staff's revenue generated from base rates is sufficient to cover all operations and maintenance. The WIFA loan surcharges will provide for debt service on the proposed WIFA loans.

BACKGROUND

During the test year ended December 31, 2010, Sabrosa provided water service to an average of 35 metered customers, 32 of which are served by 5/8 X 3/4-inch meters. Two customers are served by 1-inch meters and one customer is served by a 2-inch meter.

Sabrosa is an Arizona class D utility engaged in the business of providing potable water service. Sabrosa was granted a Certificate of Convenience and Necessity ("CC&N") to provide water service per Decision No. 41243, effective April 20, 1971.

The original owner of the Company, Keith Morris abandoned the system, and the Company has been operating under the management of interim managers appointed by the Commission. On December 6, 2002, Citizens Water Services Company of Arizona ("Citizens") was appointed the interim manager of Sabrosa. Arizona-American Water Company ("AZ-AM") who assumed ownership of Citizens served as interim manager until the end of January, 2005. On February 2, 2005, Global Water Resources, L.L.C. was appointed as the successor to AZ-AM and managed the utility until March 5, 2007, at which time the Town of Cave Creek assumed the interim management of the Company under a letter of agreement with Staff and subsequently resigned that position as of June 30, 2009. On July 1, 2009, Don Bohler of Granite Springs Water Company in Prescott, Arizona, accepted the position of interim manager for Sabrosa.

While under interim management, the Company's corporate status was dissolved on March 20, 2002, by the Commission's Corporations Division for failure to file its Corporate Annual Report, and the CC&N was revoked by the Commission in Decision No. 65217 on September 24, 2002.

On July 7, 2011, Sabrosa filed an application for a permanent rate increase with the Commission. On September 9, 2011, the Company filed an application for approval of financing for a WIFA loan in the amount of \$88,689 to fund arsenic treatment facilities. On November 2, 2011, the Company filed a revised application and requested funds totaling \$136,252 from WIFA to complete the proposed arsenic treatment facilities. On December 6, 2011, the Company filed a second financing application seeking approval of \$13,000 from WIFA to deepen the Company's Zorillo Well. Staff believes that the Company will need to deepen its well to 1,000 feet before reaching the regional aquifer in order to provide a reliable source of water. Staff estimated the total cost to be \$110,435. A Procedural Order, dated September 15, 2011, granted the Company's request to stop the time clock. Staff filed a request to restart the time clock on February 29, 2012, and a motion to consolidate the rate and financing dockets on March 9, 2012. A Procedural Order issued March 16, 2012, granted the consolidation of the three dockets.

Sabrosa filed an affidavit of mailing of the Customer Notice with Docket Control on July 7, 2011.

CONSUMER SERVICES

Staff reviewed the Commission's records for the period beginning January 1, 2009, to February 29, 2012, and found the following:

2009 – One Complaint (one quality of service)

2010 - Five Complaints (one billing, one service, three quality of service)

2011 - Zero Complaints

Two Opinions (two opposed to rate case item)

2012 – Zero Complaints, Opinions

All complaints have been resolved and closed.

A notarized affidavit of mailing “Customer Notification” was filed on July 7, 2011.

COMPLIANCE

A review of the Compliance Database shows that Sabrosa failed to file a plan describing how it will obtain a Transaction Privilege Tax (TPT) identification number and become compliant with the state rules and law for tax collected.² Staff spoke with the Company on January 23, 2012, and advised the Company to file for a new TPT license number. Staff further directed the Company to the Arizona Department of Revenue (“ADOR”) website and advised of the process on how to obtain such license. At that time, the Company stated that it would file for a new TPT license number via mail. Staff spoke with Mr. Bohler on March 21, 2012, and he indicated that he was having difficulty obtaining the necessary company information required by ADOR. Staff will continue to work with the Company to obtain the TPT number, but notes that, at this time, the Company continues to collect sales tax from its customers and remits those collections to ADOR under Granite Springs Water Company.

ENGINEERING ANALYSIS AND RECOMMENDATIONS

Staff Engineer, Dorothy Hains, inspected Sabrosa’s plant facilities on August 9, 2011, accompanied by the interim manager, Don Bohler. A complete discussion of Staff’s technical findings and recommendations and a complete description of the water system are provided in the attached Engineering Report (Attachment A).

RATE BASE

The Company did not propose a fair value rate base that differs from its original cost rate base. Staff’s adjustments decreased the Company’s proposed rate base by \$22,199, from \$59,512 to \$37,313, as shown in Schedule BCA-2, page 1. Details of Staff’s adjustment are discussed below.

² Ordered in Decision No. 69574 (issued May 21, 2007) at 7:18-21 and 10:17-18. Staff notes that this decision was issued two years prior to Mr. Bohler assuming the position of interim manager.

Plant-in-Service

Adjustment A increases Plant-in-Service by \$6,842, from \$66,112 to \$72,954, as shown on Schedule BCA-2, pages 1 and 2.

Electrical Pumping Equipment – Adjustment “a” increases this account by \$217, from \$10,564 to \$10,781, as shown on Schedule BCA-2, pages 2 and 3. Staff increased this account by \$217 to reflect the correct ending balance in the last rate case and add supported plant.

Water Treatment Equipment – Adjustment “b” increases this account by \$2,652, from \$24,056 to \$26,708, as shown on Schedule BCA-2, pages 2 and 3. Staff increased this account by \$2,652 to reflect the correct ending balance in the last rate case.

Meters and Meter Installations – Adjustment “c” increases this account by \$206, from \$3,753 to \$3,959, as shown on Schedule BCA-2, pages 2 and 3. Staff increased this account by \$206 to reflect the correct ending balance in the last rate case and add supported plant.

Other Tangible Plant – Adjustment “d” increases this account by \$3,767, from \$19,238 to \$23,005, as shown on Schedule BCA-2, pages 2 and 3. Staff increased this account by \$3,767 to reflect the correct ending balance in the last rate case.

Accumulated Depreciation

Adjustment B increases this account by \$33,722 from \$6,600 to \$40,322, as shown on Schedule BCA-2, pages 1 and 4.

In the instant application, Sabrosa calculated depreciation expense from June 2009 to December 31, 2010, the period of time Mr. Bohler had been the interim manager for the utility. Staff calculated the ending balance of accumulated depreciation by utilizing the ending plant balances and accumulated depreciation by plant account in the last rate case Decision No. 69574, reflecting plant additions and retirements as identified by Staff and applying the Commission-approved depreciation rates.

Working Capital

Sabrosa did not claim any working capital allowance. Staff’s adjustments C and D result in a net increase to working capital of \$4,681, from \$0 to \$4,681, as shown on Schedule BCA-2, pages 1 and 5.

Cash working capital was calculated by using the formula method which equals one-eighth of the operating expenses less depreciation, taxes, purchased power and purchased water expenses plus one twenty-fourth of purchased power and purchased water expenses.

OPERATING INCOME STATEMENT

OPERATING REVENUES

Staff adjustments to total operating revenue resulted in a net increase of \$2,310, from \$29,631 to \$31,941, as shown on Schedule BCA-3, pages 1 and 2. Details of Staff's adjustments are discussed below.

Metered Water Revenue – Adjustment A increases metered water revenue by \$2,310, from \$29,631 to \$31,941, as shown on Schedule BCA-3, pages 1 and 2. Staff's adjustment reflects Staff's calculation of the metered water revenue using the billing determinants provided by the Company.

OPERATING EXPENSES

Staff's adjustments to operating expenses resulted in an increase of \$5,448, from \$43,989 to \$49,438, as shown on Schedule BCA-3, page 1. The adjustments are explained below.

Purchased Water – Adjustment B decreases this account by \$1,985, from \$1,985 to \$0, as shown on Schedule BCA-3, pages 1 and 2. Staff's adjustment removes \$1,985 in water hauling expense that was reimbursed via the water hauling surcharge authorized in Decision No. 69574.

Contractual Services Expense – Adjustment C decreases this account by \$2,640, from \$27,371 to \$24,731, as shown on Schedule BCA-3, pages 1 and 2. Staff calculated the annual contractual services expense by adding \$21,821 for certified operator services, \$600 for contract labor, \$4,023 for secretarial services, \$787 for accounting services, and \$140 for meter reading services. Staff also transferred \$2,640 from contractual services expense to transportation expense.

Water Testing – Adjustment D increases water testing expense by \$1,094, from \$1,754 to \$2,848, as shown on Schedule BCA-3, pages 1 and 2. Staff's adjustment reflects the Staff Engineer's recommendation.

Transportation Expense – Adjustment E increases this account by \$2,640, from \$0 to \$2,640, as shown on Schedule BCA-3, pages 1 and 2. Staff's adjustment transfers \$2,640 from contractual services expense to transportation expense.

Depreciation Expense – Adjustment F increases this account by \$5,603, from \$3,717 to \$9,320, as shown on Schedule BCA-3, pages 1 and 3. Staff's depreciation expense reflects application of Staff's recommended depreciation rates to Staff's recommended plant balances.

Property Taxes – Adjustment G increases property tax by \$736, from \$550 to \$1,286, to reflect Staff's calculation of property tax expense, as shown on Schedule BCA-3, pages 1 and 2.

REVENUE REQUIREMENT

Staff recommends total base rates revenue of \$49,996, an increase of \$18,055, or 56.53 percent, over Staff-adjusted test year revenue of \$31,941. Staff's recommended rates and surcharges yield a cash flow of \$9,319, as shown on Schedule BCA-6, columns A and C.

Staff's total revenue requirement of \$70,268, including estimated surcharges, provides the Company with sufficient cash flow to pay operating expenses, contingencies, principal and interest on the requested loans, and to meet the minimum 1.2 debt service coverage ("DSC") ratio required by WIFA on the loans. Cash flow needs and DSC requirements determined the revenue requirement.

RATE DESIGN

Schedule BCA-4 presents a complete list of the Company's present, proposed, and Staff's recommended rates and charges.

Sabrosa proposed total operating revenue of \$37,814, an increase of \$8,183 or 27.62 percent above the test year revenue of \$29,631, as shown on Schedule BCA-1. Although the Company proposed the increase, it failed to propose any changes in current rates; therefore Schedules BCA-4, BCA-5, BCA-5.1, and BCA-5.2 reflect no increase in Company-proposed rates.

Staff's recommended rates (excluding the WIFA loan surcharges) would increase the typical 5/8 x 3/4-inch meter residential bill with a median usage of 2,433 gallons from \$54.10 to \$79.46, for an increase of \$25.36, or 46.9 percent. Once the first WIFA loan surcharge is implemented, the typical 5/8 x 3/4-inch meter residential bill of \$79.46 would increase by the amount of the surcharge, approximately \$15.93 to \$95.39. If the second WIFA loan surcharge is implemented, the typical 5/8 x 3/4-inch meter residential bill of \$95.39 would increase by the amount of the second surcharge, approximately \$21.61, to \$117.00. The combined base rate and surcharges revenues components would increase the typical 5/8 x 3/4-inch meter residential bill by \$62.90, or 116.3 percent, from \$54.10 to \$117.00, as shown on Schedule BCA-5.2.

MISCELLANEOUS SERVICE CHARGES

Establishment (After Hours), and After Hours Service Charges – The Company has proposed to continue its current Establishment (After Hours) Service Charges as shown on Schedule BCA-4. Staff agrees that an additional fee for service provided outside of normal business hours is appropriate when such service is at the customer's request or for the customer's convenience. Such a tariff compensates the utility for additional expenses incurred from providing after-hours service.

Moreover, Staff concludes that it is appropriate to apply an after-hours service charge in addition to the charge for any utility service provided after hours at the customer's request or for the customer's convenience. Therefore, Staff recommends elimination of the Company's current Establishment (After Hours). Instead of this charge, Staff recommends the creation of a separate \$25 after-hours service charge. For example, under Staff's proposal, a customer would be subject to a \$25 Establishment fee if it is done during normal business hours, but would pay an additional \$25 after-hours fee if the customer requested that the establishment be done outside of normal business hours.

FINANCING APPLICATIONS AND SURCHARGE MECHANISM

Purpose and Terms of the Proposed Financing and Surcharge Mechanism

According to the application, the purposes of the loans were to deepen and rehabilitate the Company's Zorillo Well and to complete the proposed arsenic treatment facilities. Staff examined the construction plans and estimated costs for Sabrosa's projects and found them to be reasonable and appropriate. A complete discussion of Staff's technical findings and recommendations concerning the financing applications can be found in the attached Engineering Report.

The proposed \$110,435 and \$149,877 WIFA loans are 20-year amortizing loans at a 4.0 percent interest rate.³ Based upon Staff's review of the application and the Company's unaudited 2010 financial statements, the Company lacks sufficient earnings and operating cash flow to meet its proposed long-term debt obligation. Therefore, surcharges that provide funds for the debt service on the WIFA loans are appropriate. Because the final details of the WIFA loans will not be known until after the Company has closed on the loans, Staff is recommending a surcharge mechanism.

Schedule BCA-7 presents a calculation of the additional annual revenue needed by the Company to service a \$110,435 loan over 20 years at 4.8 percent interest rate for the proposed well-deepening project. Based on Staff's calculation, \$110,435 of WIFA debt will require the Company to generate an annual cash flow of \$8,600 through the surcharge. Staff's calculation shows that a residential customer on a 5/8 x 3/4-inch meter will be required to pay a monthly surcharge of \$15.93.

Schedule BCA-8 presents a calculation of the additional annual revenue needed by the Company to service a \$149,877 loan over 20 years at 4.8 percent interest for the proposed arsenic remediation project. Based on Staff's calculation, \$149,877 of WIFA debt will require the Company to generate an annual cash flow of \$11,672 through the surcharge. Staff's calculation shows that a residential customer on a 5/8 x 3/4-inch meter will be required to pay a monthly surcharge of \$21.61.

³ Staff notes that, although the Company proposed a 4.0 percent interest rate, as of March 19, 2012, the interest on a WIFA loan for Sabrosa would be 4.5 percent. Therefore, Staff has used a conservative 4.8 percent interest rate in its calculations.

The surcharge mechanism establishes the methodology for calculating the surcharge amounts to be applied to the rates established in this rate application. Once the Company has closed on the well-deepening loan, it would submit an application in this Docket requesting implementation of the well-deepening surcharge. Staff would then calculate the appropriate surcharge and prepare and file a recommended order for Commission consideration.

If, upon completion of the well-deepening project, the well is found to provide a water supply that does not allow the Company to meet the arsenic restrictions as required by ADEQ, the Company may then execute the WIFA loan for the arsenic treatment project and apply for the implementation of that related surcharge.

CONCLUSION:

1. Maricopa County Environmental Services Department stated that there are major deficiencies in Operation and Maintenance and in water quality monitoring and reporting. The Sabrosa Water system has a major deficiency for exceeding the Maximum Contaminate Level for arsenic. (See §F of the Engineering report for discussion and details.)
2. The Sabrosa Water System has adequate storage capacity, but it does not have reliable, adequate well production. (See §C of the Engineering report for discussion and details.)

STAFF'S RECOMMENDATIONS

Staff recommends:

1. That the Commission approve the Staff-recommended rates and charges as shown on Schedule BCA-4.
2. That the Company file with Docket Control, as a compliance item in this Docket, a schedule of its approved rates and charges within 30 days after the Decision in this matter is issued.
3. That the Commission approve the Staff-recommended \$110,435 and \$149,877 financings and the associated surcharge mechanisms that may result in surcharges of \$15.93 and \$21.61 per month per customer.
4. That the actual amount of the WIFA loan surcharges be calculated based upon the actual amount of the WIFA loans and actual number of customers at the time of loan closing.
5. That the Company file as a compliance item in this Docket, within 30 days of the execution of any financing transaction authorization herein, a notice confirming that such execution has occurred and a certification by an authorized Company representative that the terms of the financing fully comply with the authorizations granted.

6. That the Company provide to Staff, upon request, a copy of any loan documents executed pursuant to the authorizations granted herein.
7. That upon filing of the loan closing notice the Company may file in this Docket an application requesting implementation of the associated surcharge.
8. That within 30 days of the filing of a surcharge implementation request, Staff shall calculate the appropriate WIFA surcharge and prepare and file a recommended order for Commission consideration.
9. That approval of the loans and surcharges be rescinded if the Company has not drawn funds from the well-deepening loan within one year of the date of the Decision resulting from this proceeding.
10. That the execution of the second WIFA loan in the amount of \$149,877 (Arsenic Treatment Facility Loan) and the request for the associated surcharge be completed only upon the Company's deepening the well and finding a water supply that does not meet the ADEQ arsenic restriction requirements.
11. That, upon approval of the WIFA of the surcharge, the Company shall open a separate interest-bearing account in which all surcharge monies collected from customers will be deposited,
12. That the only disbursement of funds from this account will be to make debt service payments to WIFA.
13. That the Company shall file, by April 15 of each year, as a compliance item in this Docket, a report reconciling all surcharge monies billed and collected, along with copies of the prior year's monthly bank statements for the surcharge account.
14. That the Company continues to use the depreciation rates as presented in Exhibit 6 of the attached Engineering Report.
15. That, because Sabrosa's calculated water loss was 46 percent, the Company shall monitor the water system closely and takes action to ensure the water loss remains 10 percent or less in the future. If water loss exceeds 10 percent, calculated on an annual basis, the Company shall, prior to filing its next rate case, come up with a plan to reduce water loss to 10 percent or less, or prepare a report containing a detailed analysis and explanation demonstrating why a water loss reduction to 10 percent or less is not feasible or cost effective.
16. That the Company file with Docket Control, as a compliance item in this Docket, by January 31, 2013, a copy of the Arizona Department of Environmental Quality ("ADEQ") Approval of Construction ("AOC") for the well-deepening and rehabilitation.

17. That, if it is necessary for Sabrosa to execute the second loan for the arsenic treatment plant, the Company file with Docket Control, as a compliance item in this Docket, by May 31, 2013, a copy of the ADEQ AOC for that plant.

Sabrosa Water Company

Docket Nos. W-02111A-11-0272, 0340 & 0435

Schedule BCA-1

Test Year Ended December 31, 2010

SUMMARY OF FILING

	-- Present Rates --		-- Proposed Rates --	
	Company as Filed	Staff as Adjusted	Company as Filed	Staff as Adjusted
Revenues:				* Does not include surcharge revenue
Metered Water Revenue	\$29,604	\$31,914	\$37,787	\$49,969
Unmetered Water Revenue	0	0	0	0
Other Water Revenues	27	27	27	27
Total Operating Revenue	\$29,631	\$31,941	\$37,814	\$49,996
Operating Expenses:				
Operation and Maintenance	\$39,722	\$38,831	\$39,722	\$38,831
Depreciation	3,717	9,320	3,717	9,320
Property & Other Taxes	550	1,286	550	1,845
Income Tax	0	0	0	0
Total Operating Expense	\$43,989	\$49,437	\$43,989	\$49,996
Operating Income/(Loss)	(\$14,358)	(\$17,496)	(\$6,175)	(\$0)
Rate Base O.C.L.D.	\$59,512	\$37,313	\$59,512	\$37,313
Rate of Return - O.C.L.D.	N/M	N/M	N/M	0.0%
Operating Margin	N/M	N/M	N/M	0.0%
Debt Service Coverage Ratio (Pre-Tax)	N/M	N/M	N/M	0.46

* Amount included in base rates only. See Schedule BCA-6, column C for the combined effect, including Staff recommended loan surcharges, not reflected here.

Sabrosa Water Company

Docket Nos. W-02111A-11-0272, 0340 & 0435

Test Year Ended December 31, 2010

Schedule BCA-2

Page 1 of 5

RATE BASE

	----- Original Cost -----		
	Company	Adjustment	Staff
Plant in Service	\$66,112	\$6,842 A	\$72,954
Less:			
Accum. Depreciation	6,600	33,722 B	40,322
Net Plant	\$59,512	(\$26,880)	\$32,632
Less:			
Plant Advances	0	0	0
Accumulated Deferred Income Taxes	-	0	-
Total Advances	-	0	-
Contributions Gross	0	0	0
Less:			
Amortization of CIAC	0	0	0
Net CIAC	0	0	0
Total Deductions	-	0	-
Plus:			
1/24 Power	0	\$86 C	\$86
1/8 Operation & Maint.	0	4,595 D	4,595
Inventory	0	0	0
Prepayments	0	0	0
Total Additions	\$0	\$4,681	\$4,681
Rate Base	\$59,512	(\$22,199)	\$37,313

Explanation of Adjustment:

- A - Refer to Schedule BCA-2, Pages 2 and 3
- B - Refer to Schedule BCA-2, Page 4
- C - Refer to Schedule BCA-2, Page 5
- D - Refer to Schedule BCA-2, Page 5

Sabrosa Water Company

Docket Nos. W-02111A-11-0272, 0340 & 0435

Test Year Ended December 31, 2010

Schedule BCA-2

Page 2 of 5

PLANT ADJUSTMENTS

	Company Exhibit	Adjustment	Staff Adjusted
301 Organization	\$8,501	0	\$8,501
302 Franchises	0	0	0
303 Land & Land Rights	0	0	0
304 Structures & Improvements	0	0	0
307 Wells & Springs	0	0	0
311 Electrical Pumping Equipment	10,564	217 a	10,781
320.2 Water Treatment Equipment	24,056	2,652 b	26,708
330 Distribution Reservoirs & Standpipes	0	0	0
330.1 Storage Tank	0	0	0
330.2 Pressure Tank	0	0	0
331 Transmission & Distribution Mains	0	0	0
333 Services	0	0	0
334 Meters & Meter Installations	3,753	206 c	3,959
335 Hydrants	0	0	0
336 Backflow Prevention Devices	0	0	0
339 Other Plant and Misc. Equipment	0	0	0
340 Office Furniture & Equipment	0	0	0
341 Transportation Equipment	0	0	0
343 Tools Shop & Garage Equipment	0	0	0
344 Laboratory Equipment	0	0	0
345 Power Operated Equipment	0	0	0
346 Communication Equipment	0	0	0
347 Miscellaneous Equipment	0	0	0
348 Other Tangible Plant	19,238	3,767 d	23,005
105 C.W.I.P.	0	0	0
TOTALS	\$66,112	\$6,842 A	\$72,954

Sabrosa Water Company

Docket Nos. W-02111A-11-0272, 0340 & 0435

Test Year Ended December 31, 2009

Schedule BCA-2

Page 3 of 5

STAFF PLANT ADJUSTMENTS

a -	ELECTRICAL PUMPING EQUIPMENT - Per Company	\$10,564	
	Per Staff	<u>\$10,781</u>	<u>\$ 217</u>

To properly reflect account balance per Decision 69574, and add supported plant.

b -	SOLUTION CHEMICAL FEEDERS - Per Company	\$24,056	
	Per Staff	<u>\$26,708</u>	<u>\$ 2,652</u>

To properly reflect account balance per Decision 69574.

c -	METERS AND METER INSTALLATION - Per Company	\$3,753	
	Per Staff	<u>\$3,959</u>	<u>\$ 206</u>

To properly reflect account balance per Decision 69574, and add supported plant.

d -	OTHER TANGIBLE PLANT - Per Company	\$19,238	
	Per Staff	<u>\$23,005</u>	<u>\$ 3,767</u>

To properly reflect account balance per Decision 69574.

ACCUMULATED DEPRECIATION ADJUSTMENT

	<u>Amount</u>
B - Accumulated Depreciation - Per Company	\$ 6,600
Accumulated Depreciation - Per Staff	<u>40,322</u>
Total Adjustment	<u><u>\$33,722</u></u>

ACCT		ACCUMULATED DEPRECIATION		
No.	Description	Staff Calculated	Company Application	Staff Adjustment
301	Intangibles	\$ -	\$ -	\$ -
303	Land and Land Rights	-	-	-
304	Structures and Improvements	-	-	-
307	Wells and Srings	-	-	-
311	Electrical Pumping Equipment	1,838	2,051	(213)
320.2	Water Treatment Equipment	25,818	1,602	24,216
330	Distribution Reservoirs & Standpipes	-	-	-
330.1	Storage Tank	-	-	-
330.2	Pressure Tank	-	-	-
331	Transmission and Distribution Mains	-	-	-
333	Services	-	-	-
334	Meters and Meter Installation	588	381	207
335	Hydrants	-	-	-
339	Other Plant and Miscellaneous Equipment	-	-	-
340	Office Furniture and Fixtures	-	-	-
340.1	Computers and Software	-	-	-
341	Transportation Equipment	-	-	-
343	Tools and Work Equipment	-	-	-
345	Power Operated Equipment	-	-	-
346	Communications Equipment	-	-	-
348	Other Tangible Plant	12,078	2,566	9,512
	Total	<u>\$ 40,322</u>	<u>\$ 6,600</u>	<u>\$ 33,722</u>

Sabrosa Water Company

Docket Nos. W-02111A-11-0272, 0340 & 0435

Test Year Ended December 31, 2009

Schedule BCA-2

Page 5 of 5

STAFF PLANT ADJUSTMENTS

C -	WORKING CAPITAL (1/24 Purchased Pwr & Wtr) Per Company	\$0	
	Per Staff	\$86	\$ 86

To reflect Staff's calculation of cash working capital based on Staff's recommendations for purchased power and purchased water.

D -	WORKING CAPITAL (1/8 Operation & Maint exp.) Per Company	\$0	
	Per Staff	4,595	\$ 4,595

To reflect Staff's calculation of cash working capital based on Staff's recommendations for operation and maintenance expense (excluding purchased power and purchased water expenses).

Sabrosa Water Company

Docket Nos: W-02111A-11-0272, 0340 & 0435

Test Year Ended: December 31, 2010

Schedule BCA-3

Page 1 of 3

STATEMENT OF OPERATING INCOME

	Company Exhibit	Staff Adjustments	Staff Adjusted	Increase	Staff Recommended
Revenues:					
461 Metered Water Revenue	\$ 29,604	\$ 2,310 A	\$31,914	\$18,055	\$49,969
460 Unmetered Water Revenue	-	-	-	-	-
474 Other Water Revenues	27	-	27	-	27
Total Operating Revenue	\$29,631	\$2,310	\$31,941	\$18,055	\$49,996
Operating Expenses:					
601 Salaries and Wages	\$ -	\$ -	\$ -	\$ -	\$ -
610 Purchased Water	1,985	(1,985) B	-	-	-
615 Purchased Power	2,072	-	2,072	-	2,072
618 Chemicals	-	-	-	-	-
620 Repairs and Maintenance	3,626	-	3,626	-	3,626
621 Office Supplies & Expense	678	-	678	-	678
630 Contractual Services	27,371	(2,640) C	24,731	-	24,731
635 Water Testing	1,754	1,094 D	2,848	-	2,848
641 Rents	382	-	382	-	382
650 Transportation Expenses	-	2,640 E	2,640	-	2,640
657 Insurance - General Liability	-	-	-	-	-
659 Insurance - Health and Life	-	-	-	-	-
666 Regulatory Commission Exp-Rate Case	404	-	404	-	404
675 Miscellaneous Expense	1,450	-	1,450	-	1,450
403 Depreciation Expense	3,717	5,603 F	9,320	-	9,320
408 Taxes Other Than Income	-	-	-	-	-
408.11 Property Taxes	550	736 G	1,286	559	1,845
409 Income Tax	-	-	-	-	-
Total Operating Expenses	\$ 43,989	\$ 5,448	\$ 49,438	\$ 559	\$ 49,996
OPERATING INCOME/(LOSS)	\$ (14,358)	\$ (3,138)	(\$17,496)	\$17,496	\$ -

Sabrosa Water Company

Docket Nos. W-02111A-11-0272, 0340 & 0435

Test Year Ended December 31, 2010

Schedule BCA-3

Page 2 of 3

STAFF ADJUSTMENTS

A -	METERED WATER REVENUE - Per Company Per Staff	\$29,604	
		<u>\$31,914</u>	<u>\$2,310</u>
	To add \$2,310 in metered water revenue per Company's submitted bill count.		
B -	PURCHASED WATER - Per Company Per Staff	\$1,985	
		<u>0</u>	<u>(\$1,985)</u>
	To remove \$1,985 in water hauling expense reimbursed by water hauling surcharge authorized in Decision No. 69574.		
C -	CONTRACTUAL SERVICES - Per Company Per Staff	\$27,371	
		<u>24,731</u>	<u>(\$2,640)</u>
	To transfer \$2,640 from outside services expense to transportation expense.		
D -	WATER TESTING - Per Company Per Staff	\$1,754	
		<u>2,848</u>	<u>\$1,094</u>
	To reflect annual water testing expense, per Staff's Engineering Report.		
E -	TRANSPORTATION EXPENSE - Per Company Per Staff	\$0	
		<u>2,640</u>	<u>\$2,640</u>
	To add \$2,640 to transportation expense transferred from contractual outside services expense.		
G -	PROPERTY TAXES - Per Company Per Staff	\$550	
		<u>1,286</u>	<u>\$736</u>
	To reflect property tax expense using the Arizona Department of Revenue property tax method.		

STAFF ADJUSTMENTS (Cont.)

F - DEPRECIATION - Per Company \$3,717
Per Staff 9,320 \$5,603

To reflect application of Staff's recommended depreciation rates to
Staff's recommended plant, by account.

Pro Forma Annual Depreciation Expense:

Operating Income Adjustment I - Test Year Depreciation Expense

LINE NO.	DESCRIPTION	[A] Plant In Service Per Staff	[B] NonDepreciable or Fully Depreciated Plant	[C] Depreciable Plant (Col A - Col B)	[D] Depreciation Rate	[E] Depreciation Expense (Col C x Col D)
1	301 - Organization Cost	\$ 8,501	\$ 8,501	-	0.00%	\$ -
2	302 - Franchise Cost	-	-	-	0.00%	-
3	303 - Land and Land Rights	-	-	-	0.00%	-
4	304 - Structures and Improvements	-	-	-	3.33%	-
5	305 - Collecting and Impounding Res.	-	-	-	2.50%	-
6	306 - Lake River and Other Intakes	-	-	-	2.50%	-
7	307 - Wells & Spring	-	-	-	3.33%	-
8	308 - Infiltration Galleries and Tunnels	-	-	-	6.67%	-
9	309 - Supply Main	-	-	-	2.00%	-
10	310 - Power Generation Equip.	-	-	-	5.00%	-
11	311 - Electric Pumping Equipment	\$10,781	-	10,781	12.50%	1,348
12	320 - Water Treatment Equipment	-	-	-	-	-
13	320.1 Water Treatment Plants	-	-	-	3.33%	-
14	320.2 Solution Chemical Feeders	26,708	-	26,708	20.00%	5,342
15	330 - Distribution Resvrv & Standpipe	-	-	-	-	-
16	330.1 Storage Tanks	-	-	-	2.22%	-
17	330.2 Pressure Tanks	-	-	-	5.00%	-
18	331 - Transmission & Distr. Mains	-	-	-	2.00%	-
19	333 - Services	-	-	-	3.33%	-
20	334 - Meter & Meter Installations	3,959	-	3,959	8.33%	330
21	335 - Hydrants	-	-	-	2.00%	-
22	336 - Backflow Prevention Devices	-	-	-	6.67%	-
23	339 - Other Plant & Misc Equipment	-	-	-	6.67%	-
24	340 - Office Furniture and Fixtures	-	-	-	6.67%	-
25	340.1 Computers and Softwares	-	-	-	20.00%	-
26	341 - Transportation Equipment	-	-	-	20.00%	-
27	343 - Tools & Work Equipment	-	-	-	5.00%	-
28	345 - Power Operated Equipment	-	-	-	5.00%	-
29	346 - Communication Equipment	-	-	-	10.00%	-
30	347 - Miscellaneous Equipment	-	-	-	10.00%	-
31	348 - Other Tangible Plant	23,005	-	23,005	10.00%	2,301
32	Total Plant	\$72,954	\$8,501	\$64,453		\$9,320
33						
34	Composite Depreciation Rate (Depr Exp / Depreciable Plant):					14.46%
35	CIAC:					\$ -
36	Amortization of CIAC (Line 33 x Line 34):					\$ -
37						
38	Pro Forma Annual Depreciation Expense					
39						
40	Plant in Service					\$72,954
41	Less: Non Depreciable Plant					8,501
42	Fully Depreciable Plant					-
43	Depreciable Plant					\$64,453
44	Times: Staff Proposed Depreciation Rate					14.46%
45	Depreciation Expense Before Amortization of CIAC:					\$ 9,320
46	Less Amortization of CIAC:					\$ -
47	Test Year Depreciation Expense - Staff:					\$ 9,320
48	Depreciation Expense - Company:					\$ 3,717
49	Staff's Total Adjustment:					\$ 5,603

RATE DESIGN

Monthly Usage Charge	Present	Company	Staff
	Rates	Proposed	Recommended
5/8" x 3/4" Meter	\$39.50	\$39.50	\$ 60.00
3/4" Meter	\$ 39.50	\$ 39.50	60.00
1" Meter	39.50	39.50	105.00
1 1/2" Meter	200.00	200.00	300.00
2" Meter	320.00	320.00	395.00
3" Meter	600.00	600.00	960.00
4" Meter	1,000.00	1,000.00	1,500.00
6" Meter	\$ 2,000.00	\$ 2,000.00	3,000.00

Gallons in Minimum 0 0 0

Commodity Rates (Per 1,000 gallons)

First Tier - 0 - 3,000 gallons	\$ 6.00	\$ 6.00	N/A
Second Tier - 3,001 - 10,000 gallons	9.00	9.00	N/A
Third Tier - Over 10,000 gallons	10.80	10.80	N/A

5/8 x 3/4 & 3/4 - inch Meter Sizes

First Tier - 0 - 3,000 gallons	N/A	N/A	8.00
Second Tier - 3,001 - 10,000 gallons	N/A	N/A	16.00
Third Tier - Over 10,000 gallons	N/A	N/A	26.00

All Other Meter Sizes

First Tier - 0 - 8,000 gallons	N/A	N/A	\$ 16.00
Second Tier - Over 8,000 gallons	N/A	N/A	\$ 26.00

Water Hauling Surcharge *** \$ 39.50 ***

Service Line and Meter Installation Charges	Company			Company Proposed			Staff Recommended		
	Current Rates	Service Line Charges	Meter Charges	Total Charges	Service Line Charges	Meter Charges	Total Charges	Service Line Charges	Meter Charges
5/8" x 3/4" Meter	\$400	\$400	\$104	\$504	\$ 296	\$ 400	\$ 696	\$ 296	\$ 400
3/4" Meter	\$440	\$440	144	\$584	296	440	736	296	440
1" Meter	\$500	\$500	195	\$695	305	500	805	305	500
1 1/2" Meter	\$715	\$715	350	\$1,065	365	715	1,080	365	715
2" Meter Turbine	\$1,170	\$1,170	655	\$1,825	515	1,170	1,685	515	1,170
2" Meter Compound	\$1,700	\$1,700	1,173	\$2,873	527	1,700	2,227	527	1,700
3" Meter Turbine	\$1,585	\$1,585	983	\$2,568	602	1,585	2,187	602	1,585
3" Meter Compound	\$2,190	\$2,190	1,511	\$3,701	679	2,190	2,869	679	2,190
4" Meter Turbine	\$2,540	\$2,540	1,626	\$4,166	914	2,540	3,454	914	2,540
4" Meter Compound	\$3,215	\$3,215	2,218	\$5,433	997	3,215	4,212	997	3,215
6" Meter Turbine	\$4,815	\$4,815	3,322	\$8,137	1,493	4,815	6,308	1,493	4,815
6" Meter Compound	\$6,270	\$6,270	4,702	\$10,972	1,568	6,270	7,838	1,568	6,270

Service Charges

Establishment	\$25.00	\$25.00	\$25.00
Establishment (After Hours)	50.00	50.00	NT
Reconnection (Delinquent)	30.00	30.00	\$30.00
Meter Test (If Correct)	30.00	30.00	\$30.00
Deposit	*	*	*
Deposit Interest Per Annum	*	*	*
Re-Establishment (Within 12 Months)	**	**	**
NSF Check	25.00	25.00	\$25.00
Deferred Payment - Per Month	1.50%	1.50%	1.50%
Meter Re-Read (If Correct)	25.00	25.00	\$25.00
Late Payment Charge-Per Month	N/A	1.50%	1.50%
After Hours Service Charge	N/A	N/A	\$25.00

Monthly Service Charge for Fire Sprinkler

4" or Smaller	\$0.00	\$0.00	****
6"	0.00	0.00	****
8"	0.00	0.00	****
10"	0.00	0.00	****
Larger than 10"	0.00	0.00	****

* Per Commission Rules (R14-2-403.B)

** Number of months off system times the monthly minimum (R14-2-403(D).

*** Surcharge calculated by dividing the total water hauling costs incurred in a given month by the amount of water sold that month. The resulting rate per 1,000 gallons will then be multiplied by the gallons used in that month for customer to arrive at the surcharge per 1,000 gallons, appearing in the next month bill as a separate line item.

**** 2.00% of monthly minimum for a comparable size meter connection but no less than than \$10.00 per month. The service charge for fire sprinklers is only applicable for service lines separate and distinct from the primary water service line.

NT = No Tariff

Sabrosa Water Company

Schedule BCA-5

Docket Nos. W-02111A-11-0272, 0340 and 0435

Test Year Ended December 31, 2010

TYPICAL BILL ANALYSIS

5/8 X 3/4 Inch Meter

WITHOUT REFLECTION OF THE (LOANS) SURCHARGES IN CURRENT RATES

Average Number of Customers: 32

<u>Company Proposed</u>	<u>Gallons</u>	<u>Present Rates</u>	<u>Proposed Rates</u>	<u>Dollar Increase</u>	<u>Percent Increase</u>
Average Usage	3,646	\$63.31	\$63.31	\$0.00	0.0%
Median Usage	2,433	\$54.10	\$54.10	\$0.00	0.0%
<u>Staff Recommend</u>					
Average Usage	3,646	\$63.31	\$94.33	\$31.02	49.0%
Median Usage	2,433	\$54.10	\$79.46	\$25.36	46.9%

Present & Proposed Rates (Without WIFA Loan Surcharges and Taxes)
5/8 X 3/4 Inch Meter

<u>Gallons Consumption</u>	<u>Present Rates</u>	<u>Company Proposed Rates</u>	<u>% Increase</u>	<u>Staff Proposed Rates</u>	<u>% Increase</u>
0	\$39.50	\$39.50	0.0%	\$60.00	51.9%
1,000	45.50	45.50	0.0%	68.00	49.5%
2,000	51.50	51.50	0.0%	76.00	47.6%
3,000	57.50	57.50	0.0%	84.00	46.1%
4,000	66.50	66.50	0.0%	100.00	50.4%
5,000	75.50	75.50	0.0%	116.00	53.6%
6,000	84.50	84.50	0.0%	132.00	56.2%
7,000	93.50	93.50	0.0%	148.00	58.3%
8,000	102.50	102.50	0.0%	164.00	60.0%
9,000	111.50	111.50	0.0%	180.00	61.4%
10,000	120.50	120.50	0.0%	196.00	62.7%
15,000	174.50	174.50	0.0%	326.00	86.8%
20,000	228.50	228.50	0.0%	456.00	99.6%
25,000	282.50	282.50	0.0%	586.00	107.4%
50,000	552.50	552.50	0.0%	1,236.00	123.7%
75,000	822.50	822.50	0.0%	1,886.00	129.3%
100,000	1,092.50	1,092.50	0.0%	2,536.00	132.1%
125,000	1,362.50	1,362.50	0.0%	3,186.00	133.8%
150,000	1,632.50	1,632.50	0.0%	3,836.00	135.0%
175,000	1,902.50	1,902.50	0.0%	4,486.00	135.8%
200,000	2,172.50	2,172.50	0.0%	5,136.00	136.4%

Sabrosa Water Company

Schedule BCA-5.1

Docket Nos. W-02111A-11-0272, 0340 and 0435

Test Year Ended December 31, 2010

TYPICAL BILL ANALYSIS

5/8 X 3/4 Inch Meter

WITH REFLECTION OF \$110,435 (LOAN) SURCHARGE IN CURRENT RATES
AT \$15.93 PER CUSTOMER PER MONTH

Average Number of Customers: 32

<u>Company Proposed</u>	<u>Gallons</u>	<u>Present Rates</u>	<u>Proposed Rates</u>	<u>Dollar Increase</u>	<u>Percent Increase</u>
Average Usage	3,646	\$63.31	\$63.31	\$0.00	0.0%
Median Usage	2,433	\$54.10	\$54.10	\$0.00	0.0%
<u>Staff Recommend</u>					
Average Usage	3,646	\$63.31	\$110.26	\$46.95	74.2%
Median Usage	2,433	\$54.10	\$95.39	\$41.29	76.3%

Present & Proposed Rates (With Reflection \$110,435 WIFA Loan Surcharge) in Current Rates
5/8 X 3/4 Inch Meter

<u>Gallons Consumption</u>	<u>Present Rates</u>	<u>Company Proposed Rates</u>	<u>% Increase</u>	<u>Staff Proposed Rates</u>	<u>% Increase</u>
0	\$39.50	\$39.50	0.0%	\$75.93	92.2%
1,000	45.50	45.50	0.0%	83.93	84.5%
2,000	51.50	51.50	0.0%	91.93	78.5%
3,000	57.50	57.50	0.0%	99.93	73.8%
4,000	66.50	66.50	0.0%	115.93	74.3%
5,000	75.50	75.50	0.0%	131.93	74.7%
6,000	84.50	84.50	0.0%	147.93	75.1%
7,000	93.50	93.50	0.0%	163.93	75.3%
8,000	102.50	102.50	0.0%	179.93	75.5%
9,000	111.50	111.50	0.0%	195.93	75.7%
10,000	120.50	120.50	0.0%	211.93	75.9%
15,000	174.50	174.50	0.0%	341.93	95.9%
20,000	228.50	228.50	0.0%	471.93	106.5%
25,000	282.50	282.50	0.0%	601.93	113.1%
50,000	552.50	552.50	0.0%	1,251.93	126.6%
75,000	822.50	822.50	0.0%	1,901.93	131.2%
100,000	1,092.50	1,092.50	0.0%	2,551.93	133.6%
125,000	1,362.50	1,362.50	0.0%	3,201.93	135.0%
150,000	1,632.50	1,632.50	0.0%	3,851.93	136.0%
175,000	1,902.50	1,902.50	0.0%	4,501.93	136.6%
200,000	2,172.50	2,172.50	0.0%	5,151.93	137.1%

Sabrosa Water Company

Schedule BCA-5.2

Docket Nos. W-02111A-11-0272, 0340 and 0435

Test Year Ended December 31, 2010

TYPICAL BILL ANALYSIS

5/8 X 3/4 Inch Meter

WITH REFLECTION OF \$110,435 (LOAN) SURCHARGE IN CURRENT RATES
 AT \$15.93 PER CUSTOMER PER MONTH AND \$149,877 (LOAN) SURCHARGE
 IN CURRENT RATES AT \$21.61 PER CUSTOMER PER MONTH

Average Number of Customers: 32

<u>Company Proposed</u>	<u>Gallons</u>	<u>Present Rates</u>	<u>Proposed Rates</u>	<u>Dollar Increase</u>	<u>Percent Increase</u>
Average Usage	3,646	\$63.31	\$63.31	\$0.00	0.0%
Median Usage	2,433	\$54.10	\$54.10	\$0.00	0.0%
<u>Staff Recommend</u>					
Average Usage	3,646	\$63.31	\$131.87	\$68.56	108.3%
Median Usage	2,433	\$54.10	\$117.00	\$62.90	116.3%

Present & Proposed Rates (With Reflection \$110,435 and \$149,877 WIFA Loan Surcharges)
 in current rates
 5/8 X 3/4 Inch Meter

<u>Gallons Consumption</u>	<u>Present Rates</u>	<u>Company Proposed Rates</u>	<u>% Increase</u>	<u>Staff Proposed Rates</u>	<u>% Increase</u>
0	\$39.50	\$39.50	0.0%	\$97.54	146.9%
1,000	45.50	45.50	0.0%	105.54	132.0%
2,000	51.50	51.50	0.0%	113.54	120.5%
3,000	57.50	57.50	0.0%	121.54	111.4%
4,000	66.50	66.50	0.0%	137.54	106.8%
5,000	75.50	75.50	0.0%	153.54	103.4%
6,000	84.50	84.50	0.0%	169.54	100.6%
7,000	93.50	93.50	0.0%	185.54	98.4%
8,000	102.50	102.50	0.0%	201.54	96.6%
9,000	111.50	111.50	0.0%	217.54	95.1%
10,000	120.50	120.50	0.0%	233.54	93.8%
15,000	174.50	174.50	0.0%	363.54	108.3%
20,000	228.50	228.50	0.0%	493.54	116.0%
25,000	282.50	282.50	0.0%	623.54	120.7%
50,000	552.50	552.50	0.0%	1,273.54	130.5%
75,000	822.50	822.50	0.0%	1,923.54	133.9%
100,000	1,092.50	1,092.50	0.0%	2,573.54	135.6%
125,000	1,362.50	1,362.50	0.0%	3,223.54	136.6%
150,000	1,632.50	1,632.50	0.0%	3,873.54	137.3%
175,000	1,902.50	1,902.50	0.0%	4,523.54	137.8%
200,000	2,172.50	2,172.50	0.0%	5,173.54	138.1%

WIFA LOAN FINANCIAL ANALYSIS

Staff Adjusted Test Year and Recommended Revenue Reflecting
the Effects of Company's new Loans \$260,312 Debt¹

Line No.	[A] Staff Recommended Rates without surcharges, Loans Principal & Interest	[B]	[C] Staff Recommended Rates with surcharges, Loans Principal & Interest
1 Operating Revenue			
2 Metered Water Revenue	\$49,969	-	\$ 49,969
3 WIFA Loan Surcharge 1	-	\$ 11,672 A	\$ 11,672
4 WIFA Loan Surcharge 2	-	8,600 B	\$ 8,600
5 Other Water Revenue	\$27	-	\$ 27
6 Total Operating Revenue	<u>\$49,996</u>	<u>20,272</u>	<u>70,268</u>
7 Operating Expenses:			
8 Purchased Water/Pumping Power	\$2,072	-	\$2,072
9 Admin. & General	\$30,285	-	30,285
10 Maintenance & Testing	\$6,474	-	6,474
11 Depreciation (d)	\$9,320	-	9,320
12 Property Taxes	\$1,845	-	1,845
13 Other taxes	-	-	-
14 Total Operating Expense	<u>\$49,996</u>	<u>\$ -</u>	<u>\$49,996</u>
15 Operating Income (a)	(\$0)	\$20,272	\$20,272
16 Interest Income	-	-	-
17 Interest Expense (b)	-	\$12,322 C	12,322
18 Total Other Interest Expense	\$0	(\$12,322)	(\$12,322)
19 Net Income	<u>(\$0)</u>	<u></u>	<u>\$7,950</u>
20 Rate Base	37,313		37,313
21 Rate of Return (Line 15 / line 20)	(0.00)		54%
22 Operating Margin (Line 23 / Line 6)	(0.00)		29%
23 Principal Repayment (c)	-	7,950 D	\$ 7,950
25 Cash Flow (L19+L11-L23)	\$9,319		\$9,320
22 DSC			
23 [(a) + (d)] + [(b) + (c)]	N/M		1.46

CAPITAL STRUCTURE

24 Short-term Debt	\$0	0.0%	\$ 7,950	3.9%
25 Long-term Debt	\$0	0.0%	\$252,362	124.3%
26 Common Equity	(\$57,281)	100.0%	(\$57,281)	-28.2%
27 Total Capital	(\$57,281)	100.0%	\$ 203,036	100.0%

¹ 20-year amortizing loans at 4.8 percent per annum.

CALCULATION OF SURCHARGE AMOUNT
Well-Deepening

Well-Deepening Loan Amount				\$ 110,435
Total Yearly Interest and Principal Payments Based on a 20-year WIFA Loan and a 4.8% Interest Rate.*				\$ 8,600
Annual Income Tax Component of the Surcharge Revenue				\$ -
Total Annual Surcharge Revenue Requirement for the Loan				\$ 8,600
Total Equivalent Annual Bills				540
5/8"x 3/4" Meter Surcharge Amount	\$8,600	÷	540	\$ 15.93
3/4" Meter Surcharge Amount	\$15.93	x	1.5	\$ 23.89
1" Meter Surcharge Amount	\$15.93	x	2.5	\$ 39.82
1 1/2" Meter Surcharge Amount	\$15.93	x	5.0	\$ 79.63
2" Meter Surcharge Amount	\$15.93	x	6.0	\$ 127.41
3" Meter Surcharge Amount	\$15.93	x	16.0	\$ 254.82
4" Meter Surcharge Amount	\$15.93	x	25.0	\$ 398.15
6" Meter Surcharge Amount	\$15.93	x	50.0	\$ 796.31

Meter Size	Number of Customers	Customer Multiplier	Equivalent Customers	Equivalent No. of Bills	Monthly Surcharge	Yearly Surcharge	Total Amount
5/8" x 3/4" Meter	32	1	32	384	\$ 15.93	\$ 191.11	\$6,115.64
3/4" Meter	-	1.5	-	-	23.89	-	-
1" Meter	2	2.5	5	60	39.82	477.78	955.57
1 1/2" Meter	-	5	-	-	79.63	-	-
2" Meter	1	8	8	96	127.41	1,528.91	1,529
3" Meter	-	16	-	-	254.82	-	-
4" Meter	-	25	-	-	398.15	-	-
6" Meter	-	50	-	-	796.31	-	-
TOTAL	35		45	540			\$8,600.11

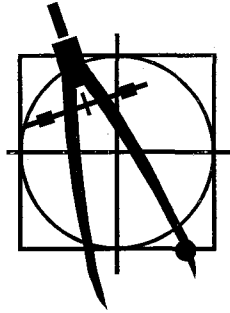
* Staff notes that, although the Company proposed a 4.0 percent interest rate, as of March 19, 2012, the interest on a WIFA loan for Sabrosa would be 4.5 percent. Therefore, Staff has used a conservative 4.8 percent interest rate in its calculations.

CALCULATION OF SURCHARGE AMOUNT
Arsenic Treatment Plant

Arsenic Treatment Plant Loan Amount				\$ 149,877
Total Yearly Interest and Principal Payments Based on a 20-year WIFA Loan and a 4.8% Interest Rate.*				\$ 11,672
Annual Income Tax Component of the Surcharge Revenue				\$ -
Total Annual Surcharge Revenue Requirement for the Loan				\$ 11,672
Total Equivalent Annual Bills				540
5/8"x 3/4" Meter Surcharge Amount	\$11,672 ÷	540		\$ 21.61
3/4" Meter Surcharge Amount	\$ 21.61 x	1.5		\$ 32.42
1" Meter Surcharge Amount	\$ 21.61 x	2.5		\$ 54.04
1 1/2" Meter Surcharge Amount	\$ 21.61 x	5.0		\$ 108.07
2" Meter Surcharge Amount	\$ 21.61 x	6.0		\$ 172.91
3" Meter Surcharge Amount	\$ 21.61 x	16.0		\$ 345.83
4" Meter Surcharge Amount	\$ 21.61 x	25.0		\$ 540.35
6" Meter Surcharge Amount	\$ 21.61 x	50.0		\$1,080.71

Meter Size	Number of Customers	Customer Multiplier	Equivalent Customers	Equivalent No. of Bills	Monthly Surcharge	Yearly Surcharge	Total Amount
5/8" x 3/4" Meter	32	1	32	384	\$ 21.61	\$ 259.37	\$ 8,299.84
3/4" Meter	-	1.5	-	-	32.42	-	-
1" Meter	2	2.5	5	60	54.04	648.43	1,296.85
1 1/2" Meter	-	5	-	-	108.07	-	-
2" Meter	1	8	8	96	172.91	2,074.96	2,075
3" Meter	-	16	-	-	345.83	-	-
4" Meter	-	25	-	-	540.35	-	-
6" Meter	-	50	-	-	1,080.71	-	-
TOTAL	35		45	540			\$11,671.66

* Staff notes that, although the Company proposed a 4.0 percent interest rate, as of March 19, 2012, the interest on a WIFA loan for Sabrosa would be 4.5 percent. Therefore, Staff has used a conservative 4.8 percent interest rate in its calculations.



Engineering Report
Sabrosa Water Company, Inc.
Prepared By
Dorothy Hains, P. E.
Docket Nos. W-02111A-11-0272
(Rates)
Docket Nos. W-02111A-11-0340
(Financing)
Docket Nos. W-02111A-11-0435
(Financing)

January 18, 2012

EXECUTIVE SUMMARY

Recommendations:

1. Arizona Corporation Commission Utilities Division Staff ("Staff") recommends the depreciation rates by individual National Association of Regulatory Utility Commissioners category, as delineated in Exhibit 6. (See §J and Exhibit 6 for a discussion and a tabulation of the recommended rates.)
2. Staff recommends approval of the meter and service line installation charges listed under the columns labeled "Staff Recommendation" in Table 6. (See §M of report for discussion and details.)
3. Staff recommends estimated annual water testing costs of \$2,848 for Sabrosa Water Company ("Sabrosa" or "Company"). (See §I and Table 4 for discussion and details.)
4. The calculated water loss in the Sabrosa's water system was 46 percent, Staff recommends that the Company monitor the water system closely and take action to ensure the water loss remains 10 percent or less in the future. If water loss exceeds 10 percent, calculated on an annual basis, the Company shall, prior to filing its next rate case, come up with a plan to reduce water loss to 10 percent or less, or prepare a report containing a detailed analysis and explanation demonstrating why a water loss reduction to 10 percent or less is not feasible or cost effective. (See §D for discussion and details.)
5. Staff recommends that if arsenic treatment is required, the Company file with Docket Control, as a compliance item in this docket, by May 31, 2013, a copy of Arizona Department of Environmental Quality (the "ADEQ") Approval of Construction ("AOC") for the arsenic treatment. (See §K for discussion and details.)
6. Staff recommends that the Company file with Docket Control, as a compliance item in this docket, by January 31, 2013, a copy of the ADEQ AOC for the well deepening and rehabilitation. (See §L for discussion and details.)

7. Staff recommends that the Company file with Docket Control, as a compliance item in this docket within 30 days of the effective date of a decision in this proceeding, its four proposed BMPs in the form of tariffs that substantially conform to the templates created by Staff for the Commission's review and consideration. (See §M of report for discussion and details.)

Conclusions:

1. A check of the Compliance Database indicates that there appears to be 1 delinquency for Sabrosa at this time. (See §H of report for discussion and details.)
2. Sabrosa is located in the Phoenix Active Management Area and the Arizona Department of Water Resources has determined that Sabrosa is currently in compliance with departmental requirements governing water providers and/or community water systems. (See §G of report for discussion and details.)
3. Maricopa County Environmental Services Department has stated that there are major deficiencies in Operation and Maintenance and in water quality monitoring and reporting. The Sabrosa Water system has a major deficiency for exceeding the Maximum Contaminate Level for arsenic. (See §F of report for discussion and details.)
4. Sabrosa has approved cross connection and curtailment tariffs. (See §M of report for discussion and details.)
5. The Sabrosa Water System has adequate storage capacity, but it does not have reliable, adequate well production. (See §C of report for discussion and details.)
6. Staff concludes that until the water quality of the deepened well is known, Staff cannot determine if Sabrosa's proposed arsenic treatment facilities are appropriate and the cost estimates listed in the Table 4 are reasonable. (See §K of report for discussion and details.)
7. Staff concludes that the well deepening and rehabilitation is appropriate and the cost estimates as adjusted by Staff and listed in the Table 5 are reasonable. (See §L of report for discussion and details.)

TABLE OF CONTENTS

	<u>Page</u>
A. PURPOSE OF REPORT.....	1
B. LOCATION OF SYSTEM.....	1
C. DESCRIPTION OF SYSTEM.....	1
I. System Description.....	1
II. System Analysis	3
D. WATER USAGE	3
I. Water Sold.....	4
II. Non-account Water.....	4
E. GROWTH PROJECTION.....	4
F. ARIZONA DEPARTMENT OF ENVIRONMENTAL QUALITY (“ADEQ”) COMPLIANCE.....	4
G. ARIZONA DEPARTMENT OF WATER RESOURCES (“ADWR”) COMPLIANCE.....	5
H. ACC COMPLIANCE	5
I. WATER TESTING EXPENSES.....	5
J. DEPRECIATION RATES	6
K. FINACING APPLICATION (DOCKET NO. W-02111A-11-0340).....	6
L. FINACING APPLICATION (DOCKET NO. W-02111A-11-0435)	8
M. OTHER ISSUES	9
I. Service Line and Meter Installation Charges	9
II. Curtailment Tariff.....	10
III. Cross Connection or Backflow Provention Tariff.....	10
IV. Best Management Practices (“BMPs”) Tariff.....	10

EXHIBITS

Exhibit 1: Sabrosa Certificate Service Area	12
Exhibit 2: Location of Sabrosa Service Area.....	13
Exhibit 3: Systematic Drawing	14
Exhibit 4: Water Usage in Sabrosa Service Area	15
Exhibit 5: Actual and Projected Growth in Sabrosa Service Area	16
Exhibit 6: Depreciation Rates	17
Exhibit 7: Local and/or Regional Messaging Program Tariff – BMP 1.1	18
Exhibit 8: Customer High Water Use Notification Tariff – BMP 3.7	19
Exhibit 9: Leak Detection Program Tariff – BMP 4.1.....	21
Exhibit 10: Water System Tampering Tariff – BMP 5.2.....	23

ENGINEERING REPORT
SABROSA WATER COMPANY, INC.
DOCKET NO. W-02111A-11-0272 (RATES)
DOCKET NO. W-02111A-11-0340 (FINANCING)
DOCKET NO. W-02111A-11-0435 (FINANCING)

A. PURPOSE OF REPORT

This report was prepared in response to the applications filed by Sabrosa Water Company ("Sabrosa" or "Company") with the Arizona Corporation Commission ("ACC" or "the Commission") to increase its water rates and for authority to incur long term debt in the amount of \$136,252 to finance the construction of arsenic treatment facilities and for authority to incur long term debt in the amount of \$13,000 to rehabilitate and deepen the Company's Zorillo Well.

An inspection of the Company's water system was conducted by Dorothy Hains, Commission Staff Engineer, accompanied by Company Interim Operator, Don Bohler on August 9, 2011.

B. LOCATION OF SYSTEM

The Company is located northwest of the Town of Cave Creek and east of I-17, near the Carefree Highway in unincorporated Community of New River, in Maricopa County. Attached Exhibits 1 and 2 detail the location of the service area in relation to other Commission regulated companies in Maricopa County and in the immediate area. The Company serves an area approximately one square mile in size that includes a portion of Section 5, of Township 6 North, Range 3 East.

C. DESCRIPTION OF SYSTEM

I. System Description

The Company owns and operates Public Water System ("PWS") No. 07-052 consisting of two active wells (both wells are shallow wells) that have a combined 50 gallons per minute ("GPM") capacity (well capacity is extremely unreliable), one 5,000 gallon storage tank, one 50 gallon pressure tank, a booster pump station and a distribution system serving approximately 35 metered customers. Maricopa County Environmental Services Department ("MCESD") cited two Entry Points to the Distribution System ("EPDS") in this system. Sufficient water production is an issue for the water system during dry conditions when precipitation is not adequate to recharge the local aquifer. Recently the Company has had to rely on water hauling to keep up with the demand. There is no fire flow requirement in the area serviced. Wastewater service is provided by septic systems.

Exhibit 3 is a schematic drawing of the water system. A detailed listing of the Company's water system facilities are as follows:

Table 1 Plant Data in Sabrosa System (PWS #07-052)

Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 2

Active Drinking Water Wells

ADWR No.	Year Drilled	Casing Size (inches)	Well Depth (ft)	Well Meter Size (inches)	Pump (HP)	Pump Yield (GPM)	Location
55-527012 (Zorillo Well)	1990	5	205	2	5	37	45616 N Zorillo Dr (Maricopa Co.)
55-635812 (Sabrosa Well)	1982	10-12	376	1	5	13	45020 N 6 th St. (Maricopa Co.)

Active Storage, Pumping

Location	Structure or equipment	Capacity
45020 N 6 th St.	Pressure tank	One 50 gal
	Storage Tank	One 5,000 gal
	Booster pump station	One 1½-HP
45616 N Zorillo Dr	Pressure Tank	One 50 gal

Distribution Mains in Sabrosa CC&N Area

Diameter (inches)	Material	Length (feet)
4	N/A	N/A
6	N/A	N/A
		20,000 (total)

Meters in Sabrosa CC&N Area

Size (inches)	Quantity
5/8 x 3/4	35
3/4	N/A
1	2
1½	N/A
2	1
3 (comp)	N/A

Inactive Well

ADWR No.	Year Drilled	Casing Size (inches)	Well Depth (ft)	Well Meter Size (inches)	Pump (HP)	Pump Yield (GPM)	Location
55-527010 (Wright Well)	1990	8	202	2	N/A	15	45228 N New River Rd (Maricopa Co.)

Inactive Pumping

Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 3

Location	Structure or equipment	Capacity
45020 N 6 th St	Storage Tank	One 24,000 gal

II. System Analysis

As indicated above, the Company's wells have not been able to produce enough water recently and the Company has had to resort to water hauling on a full time basis to supply water to its customers. The Company's two wells have been producing little if any water since November of last year and the Company has been hauling water to fill its storage tank since then. The system has adequate storage capacity, but it does not have reliable, adequate well production.

D. WATER USAGE

Table 2 summarizes water usage in the Company's CC&N area during the test year (January 2010 to December 2010). Exhibit 4 graphically illustrates water consumption data in gallons per day ("GPD") per connection during the test year.

Table 2 Water Usage in Sabrosa CC&N Area

Month	Number of Customers	Water Sold (in gallons)	Water pumped (in gallons)	Water purchased (in gallons)	Daily Average (in gpd/customer)
Jan 10	37	109,250	356,800	27,000	95
Feb 10	37	115,010	276,200	12,000	111
Mar 10	36	96,130	154,300	4,000	86
Apr 10	36	123,140	228,100	0	114
May 10	35	128,580	242,540	0	119
Jun 10	35	182,335	197,430	0	174
Jul 10	36	148,750	187,280	0	133
Aug 10	35	138,230	193,800	0	127
Sep 10	34	129,000	205,500	0	126
Oct 10	34	128,090	242,260	0	122
Nov 10	34	183,920	227,160	0	180
Dec 10	34	93,800	359,170	0	89
total		1,576,235	2,870,540	43,000	
Average					123

Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 4

I. Water Sold

Based on information provided by the Company, during the test year the Company experienced an overall daily average use of 123 GPD per customer, a high use of 180 GPD per customer, and a low use of 86 GPD per customer. The highest total monthly use occurred in November, when a total of 183,920 gallons were sold to 34 customers. The lowest total monthly use occurred in December, when 93,800 gallons were sold to 34 customers.

II. Non-account Water

Non-account water should be 10 percent or less and never more than 15 percent. It is important to be able to reconcile the difference between the water sold and the water produced by the source. A water balance will allow a water company to identify water and revenue losses due to leakage, theft, and flushing, etc. The calculated water loss in the Company's water system was 46 percent, which exceeds Staff's recommended 10 percent threshold.

Staff recommends that the Company monitor the water system closely and take action to ensure the water loss remains 10 percent or less in the future. If water loss exceeds 10 percent, calculated on an annual basis, the Company shall, prior to filing its next rate case, come up with a plan to reduce water loss to 10 percent or less, or prepare a report containing a detailed analysis and explanation demonstrating why a water loss reduction to 10 percent or less is not feasible or cost effective.

E. GROWTH PROJECTION

Based on the service meter data contained in the Company's annual reports, the number of customers declined from 69 at the end of 2001 to 34 at the end of 2010, which results in a negative growth rate of 0.5 customers per year for the period.

F. MCESD COMPLIANCE

Based on memorandums dated July 14, 2011, MCESD has determined that the Sabrosa water system is currently not in compliance with its requirements. MCESD stated that there are major deficiencies in Operation and Maintenance ("O&M") and in water quality monitoring and reporting. The system has a major deficiency for exceeding the Maximum Contaminate Level ("MCL") for arsenic.

See Section K of this report regarding Sabrosa's financing application to fund the construction of treatment facilities to address the arsenic issue.

G. ARIZONA DEPARTMENT OF WATER RESOURCES ("ADWR") COMPLIANCE

Sabrosa is in ADWR's Phoenix Active Management Area ("AMA"). Staff received a Compliance Status Report from ADWR for Sabrosa on July 15, 2011. In its reports ADWR stated that Sabrosa is compliant with departmental requirements governing water providers and/or community water systems.

H. ACC COMPLIANCE

A check of the Utilities Division Compliance Section database showed one delinquent Commission compliance item for Sabrosa¹ for failure to file a plan describing the actions it will take to obtain a Transaction Privilege Tax (TPT) identification number and become compliant with state TPT rules and law for tax collected.

I. WATER TESTING EXPENSES

Sabrosa is subject to mandatory participation in the ADEQ Monitoring Assistance Program ("MAP"). Staff calculated the testing costs based on the following assumptions:

1. MAP will do baseline testing on everything except copper, lead, bacteria, and disinfection by-products.
2. The estimated water testing expenses represent a minimum cost based on no "hits" other than lead and copper, and assume compositing of well samples. If any constituents were found, then the testing costs would dramatically increase. ADEQ testing is performed in 3-year compliance cycles. Therefore, monitoring costs are estimated for a 3-year compliance period and then presented on an annualized basis.
3. MAP fees were calculated from the ADEQ MAP invoice for calendar year 2011.
4. All monitoring expenses are based on Staff's best knowledge of lab costs and methodology and one point of entry.

Table 3 shows the estimated annual monitoring expense, based on participation in the MAP program. Water testing expenses should be adjusted to the annual expense amount of **\$2,848** shown in Table 3.

¹ Compliance check dated September 30, 2011 and January 19, 2012.

Table 3 Water Testing Cost

Monitoring -- 2 EPDSs (Tests per 3 years, unless noted.)	Cost per test	No. of tests per three year period	Total cost per three year period	Annual Cost
Bacteriological -- monthly	\$35	78	\$2,730	\$910
Inorganics -- Priority Pollutants	\$300	MAP	MAP	MAP
Radiochemical -- (1/ 4 yr)	\$60	MAP	MAP	MAP
Phase II and V:				
IOC's, SOC's, VOC's	\$2,805	MAP	MAP	MAP
Nitrites	\$25	MAP	MAP	MAP
Nitrates -- annual	\$25	MAP	MAP	MAP
Nitrates -- additional ¹	40	24	960	\$320
Arsenic -- additional ²	21	24	504	\$168
Asbestos -- per 9 years	\$180	2½	MAP	MAP
Lead & Copper -- annual*	\$45	15	\$675	\$225
TTHM/HHAs	\$360	3	\$1,080	\$360
Maximum chlorine residual levels	\$20	78	\$1,560	\$520
MAP fees (annual)				\$345.09
Total				\$2,848.09

Notes: 1. High nitrates were discovered in the Sabrosa wells so ADEQ ordered the Company to do multiple nitrate tests annually.
2. Additional tests were requested by ADEQ.

J. DEPRECIATION RATES

Staff has developed typical and customary depreciation rates within the range of anticipated equipment life. These rates are presented in Exhibit 6, and should be used to calculate the annual depreciation expense for the Company. Staff recommends the depreciation rates by individual National Association of Regulatory Utility Commissioners ("NARUC") category, as delineated in Exhibit 6.

K. FINANCING APPLICATION (DOCKET NO. W-02111A-11-0340)

On September 9, 2011, the Company filed with the Commission a financing application requesting authority to incur long term debt in the amount of \$88,689 to finance the construction of arsenic treatment facilities. On November 2, 2011, the Company filed a revised application. In its revised application the Company stated that it now plans to obtain funds totaling \$136,252 from the Water Infrastructure Finance Authority of Arizona ("WIFA") to complete the proposed arsenic treatment facilities.

A general description and breakdown of the funding required is as follows:

Table 4 Finance Related Capital Costs (Arsenic Treatment)

	Company's Proposal (\$)¹
Sabrosa Well Arsenic Treatment Plant Project	
Installation of 13 GPM arsenic treatment plant & concrete pad, coverage structure	11,562.48
Material delivery (labor)	3,468.74
Substantial completion (labor)	3,468.74
Flow test	2,312.49
Start up and due balance	2,312.49
subtotal	23,124.94
One Arsenic treatment plant (MOD33-2162CO-2-285LL)	23,800
One H2Zero Backwash unit	7,000
Engineering design fee	3,800
MCESD permit fee	1,000
Total	63,627.43
Zorillo Well Arsenic Treatment Plant Project	
Installation of 37 GPM arsenic treatment plant & concrete pad, coverage structure	11,562.48
Material delivery (labor)	3,468.74
Substantial completion (labor)	3,468.74
Flow test	2,312.49
Start up and due balance	2,312.49
subtotal	23,124.94
One Arsenic treatment plant (MOD33-2162CO-2-285LL)	35,900
One H2Zero Backwash unit	8,800
Engineering design fee	3,800
MCESD permit fee	1,000
Total	72,624.94.
Total	136,252.47

Note: 1. Sale Tax is included.

Staff concludes that the cost estimates of Sabrosa's proposal to install arsenic treatment facilities to reduce arsenic concentrations cannot be completely calculated until the water quality and quantity of the deepened well is known.

Staff recommends that if arsenic treatment is required, the Company file with Docket Control, as a compliance item in this docket, by May 31, 2013, a copy of the ADEQ Approval of Construction ("AOC") for the arsenic treatment plant.

L. FINANCING APPLICATION (DOCKET NO. W-02111A-11-0435)

On December 6, 2011 the Company filed a second financing application in order to seek funds of

\$13,000 from WIFA to deepen the Company's Zorillo Well. The proposed project would deepen the well to 500 feet from 205 feet.

Staff believes that the Company will need to deepen its well to 1,000' before reaching the regional aquifer to provide a reliable source of water. Staff understands that good producing wells in the area are typically drilled to at least 1,000 feet. However, even at 1,000 feet there is no guarantee that the deepened well will provide sufficient water.

A general description and breakdown of the funding required is as follows:

Table 5 Finance Related Capital Costs (Well Deepening & Rehabilitation)

Project Description	Company's proposal (\$)	Staff Adjustment (\$)
Zorillo Well Upgrading/replacement		
Drilling to 500' (@ \$14/ft)	4,130	
5" steel casing	6,000	
Pull existing casing & pump (labor)	2,500	
total	12,630	
Drilling 1,000' deep (@ \$24/ft) ¹		24,000
1,000' of 8" steel casing, equipment rental and labor costs ³		63,600 ¹
One 5-HP (35 GPM) submersible pump & pump installation ²		10,000
Water Quality Permit & Fees ²		2,500
subtotal		100,100
10% contingencies		10,010
Engineering Design fee, Construction Admin Support, Start up ²		3,000
Permit fee ¹		325
Total	12,630	110,435

Note:

1. Information was provided by Beeman Brothers Drilling via a fax on January 12, 2012.
2. Staff estimated costs.
3. Staff believes the well needs to be 1,000 feet deep in order to reach the regional aquifer and provide a reliable source.

Staff concludes that the well deepening and rehabilitation project is appropriate and the cost estimates as adjusted by Staff and listed in the table above are reasonable. However, no "used and useful" determination of the proposed project item was made and no particular treatment should be inferred for rate making or rate base purpose in the future.

Staff recommends that the Company file with Docket Control, as a compliance item in this docket, by January 31, 2013, a copy of the ADEQ Approval of Construction ("AOC") for the well upgrade project. (See §L for discussion and details.)

Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 9

If the water quality test results from the deepened Zorillo Well indicate its arsenic level below the MCL standard and arsenic treatment for the Zorillo Well is no longer required, the system should be re-evaluated to determine if any arsenic treatment is still necessary.

M. OTHER ISSUES

I. Service Line and Meter Installation Charges

The Company did not propose any changes to its meter and service line installation charges. These charges are refundable advances and the Company's existing charges are within Staff's experience of what are reasonable and customary charges. However, since the Company may at times install meters on existing service lines, it would be appropriate for some customers to only be charged for the meter installation. Therefore, separate service line and meter charges have been developed by Staff. Staff recommends approval of the meter and service line installation charges listed under the columns labeled "Staff Recommendation" in Table 6 Staff's separate meter and service line installation charges were developed using the Company's existing combined charge.

Table 6 Service Line and Meter Installation Charges

Meter Size	Current Meter & Service Line Installation Charges	Proposed total installation Charge	Staff Recommendation (meter installation charge)	Staff Recommendation (Service Line installation charge)	Staff Recommended total charges
5/8 x 3/4-inch	\$400	\$400	\$104	\$296	\$400
3/4-inch	\$440	\$440	\$144	\$296	\$440
1-inch	\$500	\$500	\$195	\$305	\$500
1½-inch	\$715	\$715	\$350	\$365	\$715
2-inch (Turbine)	\$1,170	\$1,170	\$655	\$515	\$1,170
2-inch (Compound)	\$1,700	\$1,700	\$1,173	\$527	\$1,700
3-inch (Turbine)	\$1,585	\$1,585	\$983	\$602	\$1,585
3-inch (Compound)	\$2,190	\$2,190	\$1,511	\$679	\$2,190
4-inch (Turbine)	\$2,540	\$2,540	\$1,626	\$914	\$2,540
4-inch (Compound)	\$3,215	\$3,215	\$2,218	\$997	\$3,215
6-inch (Turbine)	\$4,815	\$4,815	\$3,322	\$1,493	\$4,815
6-inch (Compound)	\$6,270	\$6,270	\$4,702	\$1,568	\$6,270

II. Curtailment Tariff

The Company has an approved Curtailment Tariff.

III. Cross Connection or Backflow Prevention Tariff

The Company has an approved Cross Connection & Backflow Tariff.

IV. Best Management Practices ("BMPs") Tariff

In 2008, ADWR added a new regulatory program for the ADWR Third Management Plan for AMAs. The new program, called Modified Non-Per Capita Conservation Program ("Modified NPCCP"), addresses large municipal water providers (cities, towns and private water companies serving more than 250 acre-feet per year) and was developed in conjunction with stakeholders from all AMAs. Participation in the program is required for all large municipal water providers that do not have a Designation of Assured Water Supply and that are not regulated as a large untreated water provider or an institutional provider.

The Modified NPCCP is a performance-based program that requires participating providers to implement water conservation measures that result in water use efficiency in their service areas. A water provider regulated under the program must implement a required Public Education Program and choose one or more additional BMPs based on its size, as defined by its total number of water service connections. The provider must select the additional BMPs from the list included in the Modified NPCCP Program. The BMPs are a mix of technical, policy, and information conservation efforts.

Although the implementation of the Modified NPCCP is required of large municipal water providers within an AMA, the Commission has adopted the BMPs for implementation by large and small Commission regulated water companies.

On September 8, 2011, the Sabrosa docketed four selected BMPs 1.1, 3.7, 4.1 and 5.2. Copies of these BMPs are presented in Exhibit 7.

Staff concludes that the BMP Tariffs proposed are relevant to the Sabrosa's service area characteristics. The BMP Tariffs selected by the Sabrosa conform to the templates developed by Staff.

Staff recommends approval of the Sabrosa's four BMP Tariffs, BMPs 1.1, 3.7, 4.1 and 5.2, presented in Exhibit 7. Staff further recommends that the Sabrosa file with Docket Control, as a compliance item in the docket, the four BMP Tariffs listed above within 30 days of the effective date of the Commission's Decision in this proceeding.

EXHIBIT 1

Sabrosa Certificate Service Area

M A R I C O P A C O U N T Y

06	Sabrosa Water Company	04	03	02	01
Shangri-La Associates					
07	08	09	10	11	12
18	17	16	15	14	13
Arizona-American Water (Anthem) (Water and Sewer)					
19	20	21	22	23	24
30	29	28	27	26	25
31	32	33	34	35	36

EXHIBIT 2.

LOCATION OF SABROSA SERVICE AREA

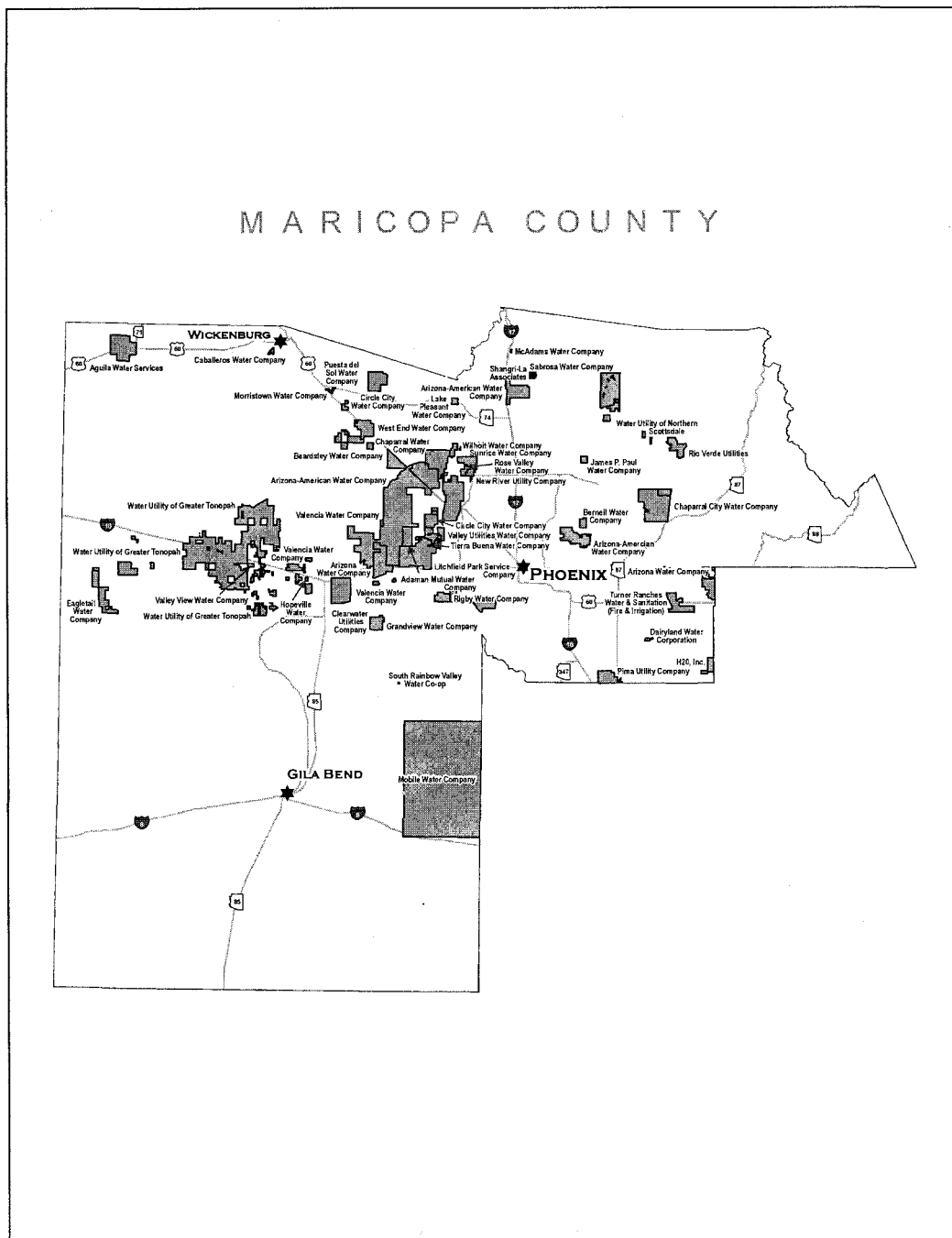


EXHIBIT 3
SYSTEMATIC DRAWING

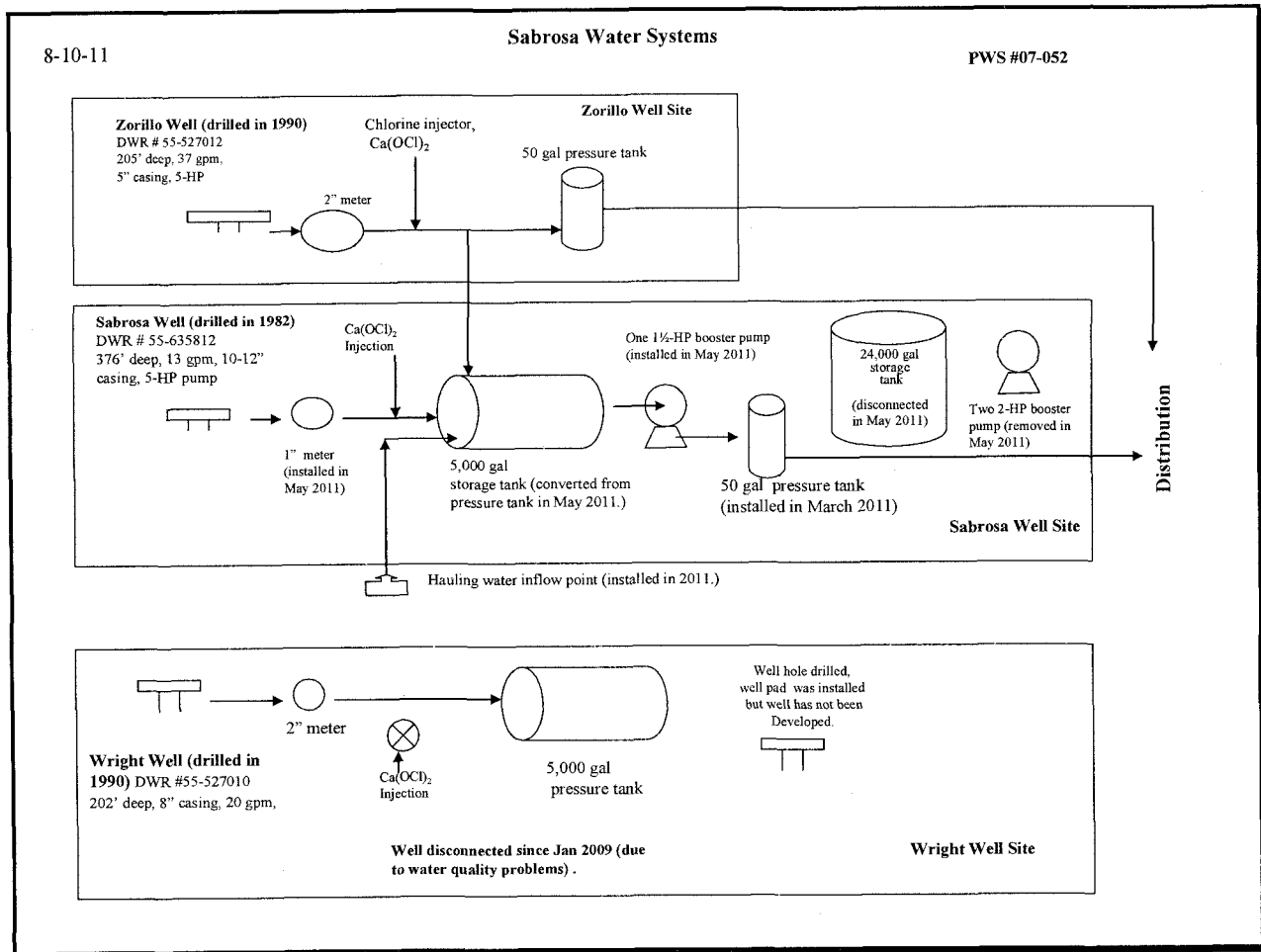
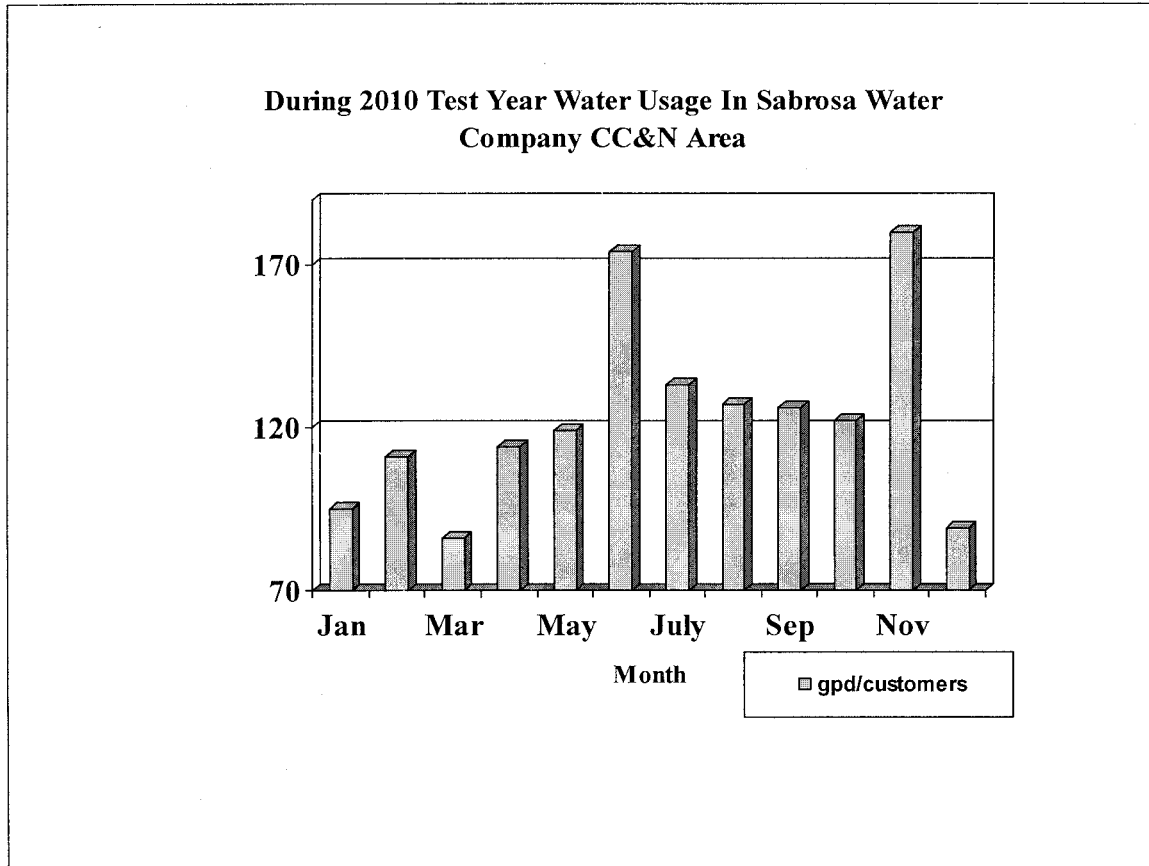


EXHIBIT 4

WATER USAGE IN THE SABROSA SERVICE AREA



Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

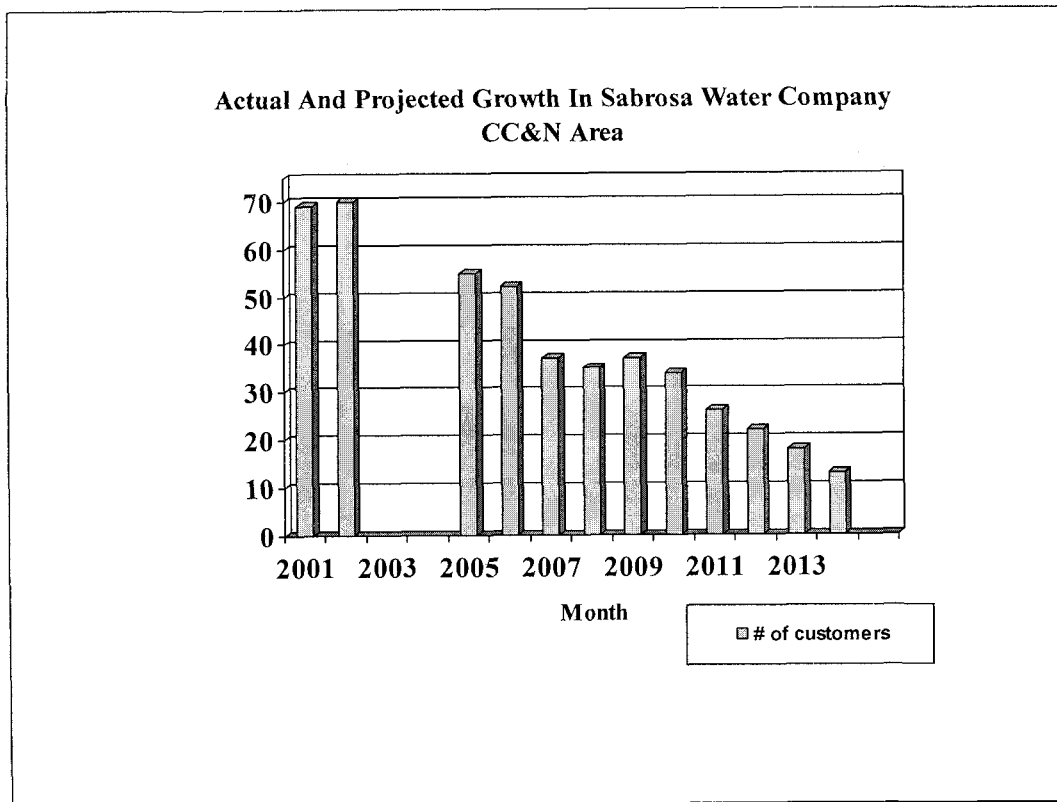
Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 15

EXHIBIT 5

ACTUAL AND PROJECTED GROWTH IN SABROSA SERVICE AREA



Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 16

EXHIBIT 6

Water Depreciation Rates

Acct. No.	Depreciable Plant	Average Service Life (Years)	Annual Accrual Rate (%)
304	Structures & Improvements	30	3.33
305	Collecting & Impounding Reservoirs	40	2.50
306	Lake, River, Canal Intakes	40	2.50
307	Wells & Springs	30	3.33
308	Infiltration Galleries	15	6.67
309	Raw Water Supply Mains	50	2.00
310	Power Generation Equipment	20	5.00
311	Pumping Equipment	8	12.5
320	Water Treatment Equipment		
320.1	Water Treatment Plants	30	3.33
320.2	Solution Chemical Feeders	5	20.0
330	Distribution Reservoirs & Standpipes		
330.1	Storage Tanks	45	2.22
330.2	Pressure Tanks	20	5.00
331	Transmission & Distribution Mains	50	2.00
333	Services	30	3.33
334	Meters	12	8.33
335	Hydrants	50	2.00
336	Backflow Prevention Devices	15	6.67
339	Other Plant & Misc Equipment	15	6.67
340	Office Furniture & Equipment	15	6.67
340.1	Computers & Software	5	20.00
341	Transportation Equipment	5	20.00
342	Stores Equipment	25	4.00
343	Tools, Shop & Garage Equipment	20	5.00
344	Laboratory Equipment	10	10.00
345	Power Operated Equipment	20	5.00
346	Communication Equipment	10	10.00
347	Miscellaneous Equipment	10	10.00
348	Other Tangible Plant	----	----

EXHIBIT 7

Local and/or Regional Messaging Program Tariff – BMP 1.1

PURPOSE

A program for the Company to actively participate in a water conservation campaign with local or regional advertizing (Modified Non-Per Capita Conservation Program BMP Category 1: Public Awareness/Public Relations 1.1: Local and/or Regional Messaging Program).

REQUIREMENTS

The requirements of this tariff are governed by Rules of the Arizona Corporation Commission and were adapted from the Arizona Department of Water Resources' Required Public Education Program and Best Management Practices in the Modified Non-Per Capita Conservation Program.

1. The Company or designated representative shall actively participate in water conservation campaign with local and/or regional advertising.
2. The campaign shall promote ways for customers to save water.
3. The Company shall facilitate the campaign through one or more of the following avenues (not an all inclusive list):
 - a. Television commercials
 - b. Radio commercials
 - c. Websites
 - d. Promotional materials
 - e. Vehicle signs
 - f. Bookmarks
 - g. Magnets
4. The Company shall keep a record of the following information and make it available to the Commission upon request.
 - a. A description of the messaging program implemented and program dates.
 - b. The number of customers reached (or an estimate).
 - c. Costs of Program implementation.

EXHIBIT 8

Customer High Water Use Notification Tariff – BMP 3.7

PURPOSE

A program for the Company to monitor and notify customers when water use seems to be abnormally high and provide information that could benefit those customers and promote water conservation (Modified Non-Per Capita Conservation Program BMP Category 3: Outreach Services Program 3.7: Customer High Water Use Notification).

REQUIREMENTS

The requirements of this tariff are governed by Rules of the Arizona Corporation Commission and were adapted from the Arizona Department of Water Resources' Required Public Education Program and Best Management Practices in the Modified Non-Per Capita Conservation Program.

5. The Company shall track water usage for each customer and notify the customer if water use seems excessive for that particular billing for that time of the year.
6. The Company shall identify customers with high consumption and investigate each instance to determine the possible cause.
7. The Company shall contact the high water use customers via telephone, email, by mail or in person. The Company shall contact the customer as soon as practical in order to minimize the possible loss of water. The customer will not be required to do anything to receive this notification.
8. In the notification the Company shall explain some of the most common water usage problems and common solutions and points of contact for dealing with the issues.
9. In the notification, the customer will be reminded of at least the following water-saving precautions:
 - a. Check for leaks, running toilets, or valves or flappers that need to be replaced.
 - b. Check landscape watering system valves periodically for leaks and keep sprinkler heads in good shape.
 - c. Adjust sprinklers so only the vegetation is watered and not the house, sidewalk, or street, etc.
 - d. Continue water conservation efforts with any pools such as installing covers on pools and spas and checking for leaks around pumps.
10. In the notification, the customer will also be reminded of at least the following ordinary life events that can cause a spike in water usage:
 - a. More people in the home than usual taking baths and showers.
 - b. Doing more loads of laundry than usual.
 - c. Doing a landscape project or starting a new lawn.
 - d. Washing vehicles more often than usual.
7. The Company shall provide water conservation information that could benefit the customer, such as, but not limited to, audit programs, publications, and rebate programs.

Sabrosa Water Co.

Docket No. W-02111A-11-0272 (rates)

Docket No. W-02111A-11-0340 (financing)

Docket No. W-02111A-11-0435 (financing)

Page 19

8. The Company shall assist the customer in a self-water audit and assist the customer in determining what might be causing the high water usage as well as supply customer with information regarding water conservation and landscape watering guidelines. As part of the water audit the Company shall confirm the accuracy of the customer meter if requested to do so by the customer (applicable meter testing fees shall apply).
9. The type of notification, the timing of the notification (i.e., how long after high water use was discovered by the Company), and the criteria used for determining which customers are notified shall be recorded and made available to the Commission upon request.

EXHIBIT 9

Leak Detection Program Tariff – BMP 4.1

PURPOSE

A program for the Company to systematically evaluate its water distribution system to identify and repair leaks (Modified Non-Per Capita Conservation Program Best Management Practice Category 4: Physical System Evaluation and Improvement 4.1 Leak Detection Program).

REQUIREMENTS

The requirements of this tariff are governed by Rules of the Arizona Corporation Commission and were adapted from the Arizona Department of Water Resources' Required Public Education Program and Best Management Practices in the Modified Non-Per Capita Conservation Program.

1. The Company shall implement a comprehensive leak detection and repair program to attain and maintain a less than 10 percent unaccounted for water loss in its system(s). The program must include auditing procedures, in-field leak detection and repair efforts. The Company shall take whatever steps are necessary to ensure that its water system is operating at optimal efficiency.
2. On a systematic basis, at least every two years (annually for smaller systems), the Company shall inspect its water distribution system (to include hydrants, valves, tanks, pumps, etc. in the distribution system) to identify and repair leaks. Detection shall be followed by repair or in some cases replacement. Repair vs. replacement will depend upon site-specific leakage rates and costs.
3. Leak Detection efforts should focus on the portion of the distribution system with the greatest expected problems, including:
 - a. areas with a history of excessive leak and break rates;
 - b. areas where leaks and breaks can result in the heaviest property damage;
 - c. areas where system pressure is high;
 - d. areas exposed to stray current and traffic vibration;
 - e. areas near stream crossings; and,
 - f. areas where loads on pipe may exceed design loads.
4. The Company shall keep accurate and detailed records concerning its leak detection and repair/rehabilitation program and the associated costs. Records of repairs shall include: possible causes of the leak; estimated amount of water lost; and date of repair. These records shall be made available to the Commission upon request.
5. The Company shall maintain a complete set of updated distribution system maps.

6. The Company shall ensure that properly functioning (accurate) and appropriately sized meters are installed on all service and source connections. All meters 1-inch and smaller shall be inspected at least once every ten years or upon registering 1,000,000 gallons of usage, whichever comes first. Meters larger than 1-inch shall be inspected at least once every five years or upon registering 1,000,000 gallons of usage, whichever comes first.
7. The inspection will be accomplished by having the meter pulled and having a Company Technician physically inspect each meter and its fittings for leaks, registers which may have become loose or are not properly attached to the meter and could be under-registering or other broken parts which need repair. In addition, meters shall be randomly selected for flow testing to identify potentially under-registering meters.
8. The Company shall conduct a water audit annually which includes the following steps to determine how efficient each water system is operating and where the losses might be.
 - a. Use coordinated monthly source and service meter readings to calculate how much water enters and leaves the system during the 12 month review period.
 - b. Track and estimate any unmetered authorized uses.
 - c. Calculate the total amount of leakage using the following formula:

$$\text{Unaccounted for water (\%)} = \frac{[(\text{Production and/or purchased water minus metered use \& estimated authorized un-metered use}) / (\text{Production and/or purchased water})] \times 100}{}$$
 - d. Authorized un-metered uses may include firefighting, main flushing, process water for water treatment plants, etc. Water losses include all water that is not identified as authorized metered water use or authorized un-metered use.
 - e. Determine possible reasons for leakage, including physical leaks and unauthorized uses.
 - f. Analyze results to determine the improvements needed, such as, better accounting practices, leak survey or replacing old distribution pipes.
9. The Company shall keep accurate and detailed records concerning its annual water audit results. These records shall be made available to the Commission upon request.

EXHIBIT 10

WATER SYSTEM TAMPERING TARIFF – BMP 5.2

PURPOSE

The purpose of this tariff is to promote the conservation of groundwater by enabling the Company to bring an action for damages or to enjoin any activity against a person who tampers with the water system.

REQUIREMENTS:

The requirements of this tariff are governed by Rules of the Arizona Corporation Commission, specifically Arizona Administrative Code ("AAC") R14-2-410 and the Arizona Department of Water Resources' Required Public Education Program and Best Management Practices in the Modified Non-Per Capita Conservation Program.

1. In support of the Company's water conservation goals, the Company may bring an action for damages or to enjoin any activity against a person who: (1) makes a connection or reconnection with property owned or used by the Company to provide utility service without the Company's authorization or consent; (2) prevents a Company meter or other device used to determine the charge for utility services from accurately performing its measuring function; (3) tampers with property owned or used by the Company; or (4) uses or receives the Company's services without the authorization or consent of the Company and knows or has reason to know of the unlawful diversion, tampering or connection. If the Company's action is successful, the Company may recover as damages three times the amount of actual damages.
2. Compliance with the provisions of this tariff will be a condition of service.
3. The Company shall provide to all its customers, upon request, a complete copy of this tariff and AAC R14-2-410. The customers shall follow and abide by this tariff.
4. If a customer is connected to the Company water system and the Company discovers that the customer has taken any of the actions listed in No. 1 above, the Company may terminate service per AAC R14-2-410.
5. If a customer believes he/she has been disconnected in error, the customer may contact the Commission's Consumer Services Section at 1-800-222-7000 to initiate an investigation.